

FINANCIAL TIMES

PUBLISHED IN LONDON AND FRANKFURT

Tuesday October 9 1979

***20p



Cloth of Distinction. Holland and Sherry LONDON. Showrooms: 7/8 Warwick St., London W1A 3AQ. Telephone: 01-437 0404.

CONTINENTAL SELLING PRICES: AUSTRIA Sch 15; BELGIUM Fc 25; DENMARK Kr 4.25; FRANCE Fc 3.5; GERMANY DM 2.0; ITALY L 7.00; NETHERLANDS Fc 2.0; NORWAY Kr 4.25; PORTUGAL Esc 35; SPAIN Ptas 60; SWEDEN Kr 3.75; SWITZERLAND Fc 2.0; EIRE 20p

NEWS SUMMARY

GENERAL BUSINESS

Nkomo tables amended plan. Patriotic Front joint leader Robert Mugabe told the Rhodesia constitutional conference last night that the Front found the British proposals defective in many respects.

Gilts fall 0.50; Equities revive. GILTS fell as hopes of a cent in MLR receded. Sterling lost up to 1/2, long lost up to 1/2, an dthe Government Securities index closed 0.50 down at 72.01.

New round of oil rises feared as Kuwait adds 10%

BY SUE CAMERON IN LONDON AND IAN HARGREAVES IN NEW YORK

Another round of major oil price rises may have been started by the decision yesterday of Kuwait, a traditionally moderate producer, to raise the price of its crude oil by 10 per cent.

Oil industry anxiety was intensified by Mexico, one of the largest producers outside the Organisation of Petroleum Exporting Countries, which warned U.S. oil company customers yesterday that it planned to raise the price of crude by \$4 a barrel. This is a rise of 17 per cent.

Kuwait's decision to put up its crude prices from \$19.49 to \$21.43 a barrel, an increase of \$1.94, will hit hardest at British Petroleum, Shell and Gulf. Gulf takes about 500,000 barrels a day from Kuwait, BP 450,000 and Shell 360,000, with an option to lift a further 45,000.

The Kuwaiti increase does not break the OPEC price ceiling of \$23.50 a barrel, imposed at the end of June. But it does disturb the price differentials among the various OPEC producers.

Companies expressed concern yesterday that Kuwait's action might start a chain reaction.

Oil executives believe the decision may have been influenced by three factors—a desire to gain ground against other OPEC producers; impact of the weakening U.S. dollar; and the hardening of spot market prices in the last two weeks.

Only last week OPEC leaders at a seminar in Vienna said that oil prices would have to go up in the near future, partly to offset effects of inflation and the depressed U.S. dollar, partly to make crude prices comparable with those for alternative energy supplies.

The fall in the dollar is fuelling oil company fears that other crude producers will follow Kuwait's lead in raising prices. But concern that Western developed nations may be heading for a recession next

Rate of materials price rise doubles

Financial Times Reporter

THE fall in the value of sterling played a major part in doubling the rate of increase in the price of industry's raw materials last month. Manufacturing industry's bill for raw materials was 1.6 per cent up on August, which itself had seen a 0.8 per cent rise on the previous month.

Output prices at the factory gate increased by 1 per cent, about the same rate as in August. This contrasts with monthly output price increases of about 2 per cent in mid-year. But price increases for the

WHOLESALE PRICES (1975=100). Table with columns: Raw Materials, Output (Home Sales), 1978 1st, 2nd, 3rd, 4th, 1979 1st, 2nd, Apr., May, June, July, Aug., Sept.

* Provisional. Source: Department of Industry

Treasury to set out long term policy

BY SAMUEL BRITTON

MAJOR TREASURY announcements expected before the end of the year will set the tone of Government economic policy for the rest of the present administration.

These will cover short and medium term public spending plans, the rolling forward of the 11 per cent monetary targets, the decision on whether to publish a medium term monetary plan, the next set of short-term forecasts and, in some ways most important of all, the choice of a new chief economic adviser to replace Sir Frederick Atkinson, who retires at the end of this year.

It has been decided to split the public expenditure announcement into two. A short White Paper this November will give details of the decision to hold down public spending in 1980-81 to within £100 million of the level of 1979-80, and what was planned by the last Labour Government. This first White Paper will be a fairly conventional document couched in "volume" terms.

Linked

Ministers are also hoping to publish the next public expenditure White Paper covering spending over a four-year horizon before Christmas. This could be linked with a medium-term financial strategy covering revenue as well as expenditure, and be linked to money supply targets for future periods.

Last Friday, Sir Geoffrey Howe, the Chancellor, took the chair at a meeting in the Treasury at which outside economists, who have been advocating medium-term monetary targets as a focus for anti-inflationary policy, had a chance to answer Treasury queries.

The outside participants included Mr. John Fleming of Oxford, Professor Terry Burns and Mr. Alan Budd of the London Business School, Professor Patrick Minford of Liverpool and Professor Brian Griffiths of the City University.

The City was represented by Mr. Gordon Pepper of Greenwells, Mr. Tim Condon of Messels and Mr. Tony Rudd of Rowe, Rudd. The Chancellor emphasised that this was an ad hoc gathering, and not a permanent inner group of advisers.

There was less argument than expected at the meeting on whether to allow the public sector borrowing requirement to rise in recession years. It was generally accepted that pride of

place would have to be given to year by year money supply targets if they were to be a plan at all; and there was some City stress on keeping the announcement as simple as possible.

It was also agreed that if these targets were to carry conviction, spending and tax plans would have to provide for a downward trend in the PSBR as a proportion of the national product. This then left open the question of whether the PSBR was correctly measured and what to do about off-tradit years.

Some of these present did not disguise their view that this was all a new world which they did not much like. The low point in what was otherwise felt to be a good discussion was when one participant asked "What will all this mean to Mr. Mike Evans?"

Another unresolved question is when and in what form to publish the autumn economic forecast to which the Government is committed under the "Bray Amendment". The view was expressed at the Friday meeting that it would be wise to sever the links between the forecasts and the Financial Statement in which the Budget is set out. The view is that it would be better to base budgetary strategy on a realistic view of the trend of output, as short-term fluctuations are both difficult to predict and potentially misleading for policy.

These views have as yet merely obtained a hearing, and by no means won the day. Sir Douglas Wass, the Permanent Secretary of the Treasury, made it very clear in his Jobian Lecture of a year ago that he was fundamentally opposed to any long-term formula for reducing monetary growth, and the grounds that this would reduce Ministers' room for manoeuvre and that he was also opposed to any downgrading of the short term forecasts now made in "real" terms.

Prof. Matthews, who is former chairman of the Social Science Research Council, is regarded as an excellent craftsman

Fed 'to take further action if necessary'

BY DAVID BUCHAN IN WASHINGTON AND STEWART FLEMING IN NEW YORK

THE LATEST moves by the U.S. Federal Reserve Board—raising its discount rate (the rate at which it lends to banks) to a record 12 per cent and changing its market tactics to curb money supply growth—will contribute to greater stability in foreign exchange markets, Mr. William Miller, the Treasury Secretary, predicted yesterday.

"We will continue to monitor these markets carefully, and will be prepared to take other complementary actions when, and if, appropriate. We intend to maintain a sound dollar," he told the American Bankers' Association meeting in New Orleans.

Other measures which the Administration could take, in addition to this weekend's moves by the Fed, include an increase in U.S. Treasury gold sales and an additional sale of so-called "Carter Bonds"—U.S. Government bonds denominated in Deutsche Marks—to add to the U.S. reserves of foreign currencies for intervention purposes. But Mr. Miller did not comment on what further actions might be taken.

The Federal Reserve actions won support yesterday from Senator William Proxmire, chairman of the Senate Banking committee, who said the decision to concentrate more on reserves it supplied to the commercial

banking system "should help the Fed get a grip on money supply growth."

Mr. Miller yesterday conceded that money supply growth has run well ahead of Fed targets in the past few months.

But Senator Proxmire said the key remedy to curbing inflation was still tighter fiscal and budgetary restraint, in which Congress had an important role to play.

In the U.S. financial markets, the response to the Fed's marked shift in monetary policy was muted. Banks and the Government bond markets were closed yesterday for the Columbus Day Holiday. Dealers reported that prices fell between 1/2 and 3/4 of a point in the corporate bond market in slack trading.

There is some scepticism about whether the central bank will move as aggressively as it appears to be suggesting it will by its new focus on the supply of bank reserves.

Some indication of what could be expected came from the Chicago Mercantile Exchange and the Chicago Board of Trade, where interest rate futures contracts are traded in Government issues. At the Board of Trade Mercantile Exchange, yields jumped the full 50 basis points beyond which they cannot move in a single day.

It is the first time that prices in these futures have moved "limit down," the Exchange reported. The package analysed, Page 18. Money markets, Page 29

DOLLAR RISES STRONGLY

THE DOLLAR rose strongly against all major currencies yesterday, after the weekend's U.S. anti-inflation package.

The U.S. currency was fixed at DM 1.7830 in Frankfurt and rose further through the day to close in London at DM 1.7847. This was 2.1 per cent above Friday's closing of DM 1.7570.

Gold fell \$13 an ounce in London to \$374.5 in fairly quiet trading. This brings the drop from last week's high point of \$446 to \$71.5 or 16 per cent.

One of the sharpest rises was against sterling, which fell 4 cents from Friday's close to \$2.1415. The trade weighted index fell from 68.5 to 68.3.

Ladbroke to drop casino control

BY JAMES BARTHOLOMEW

LADBROKE GROUP is to give up the control and management of its casino division into a separate wholly owned company to improve its chances of being granted renewal of three casino club licences next month.

Morgan Grenfell, advisers to Ladbroke, believes that there is no precedent among British companies for such a move.

Ladbroke plans to put the casino, bingo and lottery consultancy businesses into a new company called City and Provincial Gaming Holdings.

The new company will be a wholly owned subsidiary of Ladbroke but control will be taken out of Ladbroke's hands. The parent will be legally

bound to vote its shares in City and Provincial in accordance with the instructions of Ladbroke's shareholders generally.

Each year an extraordinary general meeting of Ladbroke shareholders—to be called the "gaming group" annual meeting—will precede the main annual meeting. This meeting will effectively take the decisions on elections to the Board, dividend payments and all other matters.

The new company will have a completely new board. So far six directors have been appointed, three of whom have never been connected with Ladbroke. They are Mr.

Edward Choppen, former managing director of Esso Petroleum, Major General Laurie Gingsell and Sir Desmond Heap, former president of the Law Society.

These three will also make up a new audit committee of City and Provincial which will be responsible for reviewing the activities and financial reporting of the company.

The other three directors include Mr. Geoffrey Spreckley, who will be managing director. Mr. Spreckley has been managing director of Ladbroke casino division since July. Mr. Cyril Stein, chairman and managing director of Ladbroke, is also confirmed on Back Page Lex. Back Page

CONTENTS

Table of contents listing articles and page numbers: The FED: analysis of United States crisis package, Tax avoidance: Inland Revenue v the Rossminster Group, men at the centre, Finland: step forward in N power, Japanese election: blow to Mr. Ohira, Guyana: in conflict with the IMF, Management: how an old engineering company is approaching the 'eighties' 15, Wines: new promise for Umbria, Lombard: home thoughts from abroad, by Peter Riddell, Editorial comment: Conservative conference, Japan, Survey: International energy, inset

Table of market data: American News, FT Actuarial, Saleroom, Weather, World Trade News, World Value C, INTERIM STATEMENTS, ANNUAL STATEMENTS, Parker Knoll, James Walker

Better property management can mean better company results. The guidance and know-how of professional property people like Fuller Peiser can make a substantial difference to a company's results at the end of the year. For the last ninety-odd years, our daily work has been to advise industrial and commercial firms on the use and management of their property portfolios. Bricks, mortar and land are often the most underused assets of all. By developing a non-productive corner of a site; by negotiating the best possible leasing and rental terms; by acquiring and disposing of property wisely and at the right time; by carrying out regular asset and plant and machinery valuations; by building your next factory or office to achieve maximum value at minimum cost; by contesting your rating assessment; in these and many other ways, solid financial benefits can be won. An up-to-date insurance valuation could even save your business should fire strike. The services offered by Fuller Peiser cover all these important functions in a highly professional and effective way. Full details are available from our Head Office at the address below.

Fellow Front leader Joshua Nkomo tabled an amended outline constitution, but Lord Carrington, the conference chairman, said there was little realistic prospect of agreement on the basis of a document differing substantially from his own plan.

In Salisbury all 34 of the Rhodesian Front Party in the country voted unanimously to support Ian Smith's rejection of Britain's proposals. Back Page

Rhodioid jailed. Dr. Eschel Rhodioid, former mastermind of South Africa's secret propaganda war, was jailed for six years after being found guilty in Pretoria of fraud. Page 4

Times crisis. A major new National Graphical Association pay claim, including demands for extra staff and longer holidays, was described as completely unacceptable by Times Newspapers management last night. It described the development as "very grave."

Basque killings. Guerrillas stepped up their campaign of violence in Spain's Basque territory, killing three policemen—including the head of the criminal investigation department in Pamplona—and injuring nine.

Election setback. Japanese voters upset all predictions by returning the ruling Liberal Democratic Party to office with only 258 seats, two more than the number required to give the party a bare majority in the Lower House of the Diet. Back Page; Editorial comment Page 18

Tube attack. A girl, aged between 12 and 15, was severely injured by a train when she was apparently pushed on to the line at Shepherd's Bush Underground station. A woman was later being interviewed by police after going to Notting Hill police station.

China visit. Plans are being drawn up for Sir Keith Joseph, Industry Secretary, to visit China early next year, when he will discuss potential industrial orders for UK companies. Chinese Premier Hua Guofang is to visit Britain from October 28 to November 3. Back Page

Body found. The body of Cardiff taxi driver Jack Armstrong, who had been missing for nearly 72 hours, was found in a lane near Cowbridge, Glamorgan.

Radiactive leak. The Swissair DC-8 which burst into flames while landing at Athens airport was carrying radioactive isotopes and some radioactivity leaked into the air, police said. Briton Eric Hall was among the 14 people killed in the crash.

Briefly. Actor George Woolley—Joby Woodford in The Archers—died in hospital after a short illness. Brazil is to ban whaling in its territorial waters from January 1, 1981. Archaeologists have unearthed a medieval ship, built on a Viking design, in the centre of Stockholm.

LABOUR. VAUXHALL production workers at Ellesmere Port, Merseyside, voted to continue their five-week strike in spite of a company warning about the future of the plant. Page 11

COMPANIES. GLAXO HOLDINGS reports pre-tax profits for the year ended June 30 1979 down to £72.27m from £86.36m. Page 20 and Lex. FREEMANS (London SW9) lifted pre-tax profits for the 28 weeks to August 31, 1979, from £7.21m to £7.8m on turnover up from £100.8m to £114.7m. Page 20 and Lex

FALLS. Nth. Brit. Properties 122 + 7, Office Electronic 225 + 31, Photo-Me 395 + 25, Boral Electronics 269 + 25, Reed Executive 100 + 7, Reed Intl. 190 + 8, Status Discount 83 + 6, Sunley (B.) 575 + 24, Tarmac 3162 + 7, Oil Exploration 482 + 6, Siebens (UK) 380 + 18, Floor Gold 973 + 46, Libanon 720 + 51

CHIEF PRICE CHANGES YESTERDAY. (Prices in pence unless otherwise indicated). RISES. Anchor Chemical 85rd + 12, Armstrong Equip. 623rd + 41, Assed Newspapers 285 + 13, Atlantic Assets 155rd + 12, B and Q (Retail) 103 + 9, BPC 44 + 4, Bank of Scotland 283 + 10, Beecham 155 + 8, Campbell Isberwood 173 + 50, Dutton-Porshaw 73 + 4, Ellis and Everard 106 + 5, Hill Lowell 80 + 5, Howley Leisure 47 + 44, Henriques (A.) 37 + 9, ICI 374 + 9, Intl. Thomson 414 + 11, Laurence Scott 82 + 9, A (E30 Pct) 229 + 10, Fremers (London) 162 + 7, Low (Wm.) 133 + 13, Lyles (S.) 70 + 5, New Agency Music 165 + 12, Nini. Carbonising 94 + 11

FALLS. Nth. Brit. Properties 122 + 7, Office Electronic 225 + 31, Photo-Me 395 + 25, Boral Electronics 269 + 25, Reed Executive 100 + 7, Reed Intl. 190 + 8, Status Discount 83 + 6, Sunley (B.) 575 + 24, Tarmac 3162 + 7, Oil Exploration 482 + 6, Siebens (UK) 380 + 18, Floor Gold 973 + 46, Libanon 720 + 51

EUROPEAN NEWS

Italian banks expected to raise interest rates today

BY PAUL BETTS IN ROME

ITALY'S MAIN commercial banks are today expected to increase their lending and deposit rates, after yesterday's 1.5 point rise to 12 per cent in the central bank's discount rate. At a meeting of the Italian Banking Association, due today, the commercial banks are expected to increase their lending rate to prime borrowers, at present standing at 15 per cent, by between 1 and 1.5 points.

Italian money market rates made a general upward adjustment yesterday, after the increase in the discount rate. The Bank of Italy also set higher selling rates for Treasury Bills which it sells on the secondary market maturing between February and August 1980. These went up by between 0.55 and 1.2 per cent above last week's rates.

The general increase in Italian interest rates, reflecting concern over worsening inflation, is largely designed to halt pressure on the Lira. Differences between Italian rates and those of other markets had encouraged increasing short-term capital outflows during the past few days.

The decision to increase the discount rate—the first adjustment in the key central bank rate since September 1978—was recommended by Dr. Paolo Baffi, outgoing Bank of Italy Governor, who formally stepped down yesterday.

Dr. Baffi, who in the last four years has been largely responsible for the skillful custodianship of the Italian currency, handed over the Governorship to Dr. Carlo Ciampi, the former central bank Director-General.

The minority Government of Sig. Francesco Cossiga, now under pressure from the unions, is understood to have hesitated before introducing the measures to curb money supply.

The decision also reflects the monetary authorities' growing alarm over the acceleration of domestic inflation, now running at an annual rate of more than 15 per cent, or three points above the original target for this year.

Italy's overall balance of payments performance is still expected to be satisfactory this year—with a large surplus, albeit smaller than last year—but a combination of factors are now putting renewed pressure on the economy.

These include deteriorating terms of trade after the sharp rise in oil prices, worsening inflation, and a continuing increase in the unemployment rate, now standing at 8.3 per cent. The Government has also been facing growing union demands to boost growth and increase employment, particularly in the depressed south.

Growth is expected to average about 4 per cent this year, but is expected to drop back to about 2.5 per cent in 1980. Signs already exist that the recent recovery in industrial production is ending.

The unions yesterday criticised the decision to increase the discount rate. They claim the move could have repercussions on industrial output.

Ecologists' gains shock W. German parties

By Jonathan Carr in Bonn

THE WEST GERMAN political parties have been shocked into analysis of their campaign strategy following the unexpected success of ecologists in a provincial election at the weekend.

For the first time the so-called "Green List" has won representation in a Land (State) parliament, gaining 3.1 per cent of the vote in Bremen and four seats in the State legislature.

The ecologists have had minor successes over the past year or two but until now they have not been able to win the minimum 5 per cent support needed under German law to gain a parliamentary seat.

The fact that they have now done so—with the country facing a general election a year from now—is being taken seriously by the headquarters of the main parties in Bonn.

On the face of it, the Social Democrat Party (SPD)—the senior partner in the Government coalition in Bonn with the liberal Free Democrats (FDP)—has least cause for concern at the Bremen result.

The SPD won 48.4 per cent of the vote—slightly more than it did in the last Bremen state election—and will continue alone to form the government.

The main opposition Christian Democrat Party (CDU) saw its support fall—to 31.9 per cent from 33.7 per cent. This was not unexpected. The local CDU leader recently resigned because he deplored opposition to the decision, at national level, to choose the right-leaning Herr Franz Josef Strauss to lead the opposition into next year's general election.

But the most unsatisfactory result was that of the FDP—which saw its share of the vote drop from 12.9 per cent to 10.7 per cent.

The FDP gained only 7.9 per cent of the vote at the last general election in 1976—and thus can ill afford the new competition the ecologists present.

EEC to boost electronics

BY GUY DE JONQUIERES, COMMON MARKET CORRESPONDENT IN BRUSSELS

THE EUROPEAN Commission intends to make a number of proposals before the end of this year aimed at helping Community industry capture, by 1980, one-third of the world market in telecommunications equipment, computers, micro-processors and related fields.

Mr. Roy Jenkins, president of the Commission, said yesterday that Europe was already lagging way behind the U.S. and Japan in exploiting this market. He warned that without a big concerted effort the gap would widen during the next few years.

The scale of effort required would not be achieved by European countries acting alone, he said. The Commission was planning to make a "major initiative" before the European "Summit" in Dublin at the end of next month which would call for EEC action in four broad areas:

- The removal of trade barriers and discrimination among EEC member states, to encourage the development of a genuine common market in advanced technology.
- The establishment of common technical standards throughout the Community to make different types of equipment compatible with each other.
- Greater harmonisation of public procurement policies, designed to open up national markets to companies in other member states and to afford them a degree of preference over competitors based outside Europe.
- Closer co-ordination of national research and development programmes, especially in the space, telecommunications and micro-processor fields. The Commission is expected to propose that the EEC help finance certain joint projects undertaken by two or more countries.

The broad strategy envisaged is mainly the branch of Viscout Etienne Davignon, the Industry Commissioner, who is keen to extend his area of interest beyond contracting sectors like steel and textiles.

The Commission's past attempts to foster common policies for expanding industries like aerospace have foundered because they were considered politically too ambitious. Viscout Davignon clearly hopes that by basing his proposals on closer collaboration between national Governments and on strengthening the EEC's internal market he will be able to win a wider measure of support.

The plan, however, will have to surmount a number of obstacles, perhaps the most important being rivalry between different member countries.

Spanish town in Gibraltar border protest

By Our Own Correspondent

THE MAIN political parties, trade unions and other public bodies in the Spanish border town of La Línea have today called a day of protest over the area's economic decline since the Madrid Government closed the frontier with Gibraltar ten years ago.

The Spanish Government has since lifted the ban on telephone communications. There are also hopes that formal talks on Gibraltar's future will reopen following a meeting at the United Nations recently between Lord Carrington, the British Foreign Secretary, and Sr. Marcelino Oreja, his Spanish counterpart.

Meanwhile the feeling is growing in La Línea that unless Madrid is prepared to provide help on a large scale, the town will be unable to overcome the mounting problems brought about by the border closure.

EEC on agenda at Eanes talks

BY ROBERT MAUTHNER IN PARIS

PORTUGUESE membership of the European Common Market will be a main subject on the agenda at talks between President Giscard d'Estaing and President Antonio Ramalho Eanes of Portugal (right), who arrived for a four-day official visit to France yesterday.

In spite of the lukewarm attitude adopted by France to Portuguese entry to the Community when Portugal made its application in 1977, the Portuguese have been encouraged by President Giscard d'Estaing's latest statement on the subject.

During a visit to south-west France last week, the President went out of his way to state that the entry into the Community of both Portugal and Spain was in the interests of France. He was speaking in a wine-growing region which is strongly opposed.

Portugal has also received assurance from M. Giscard d'Estaing on another subject of potential conflict between the two countries—the future of 900,000 Portuguese immigrants working in France. In a letter addressed to Gen. Eanes last month, the French President gave an undertaking that new regulations affecting immigrants in France would not apply to the Portuguese community.

In an interview with Le Monde, Gen. Eanes underlined his European convictions and stressed that Europe should become increasingly independent. But he was equally firm in emphasising the need for the maintenance of the North Atlantic Treaty Organisation for as long as the Warsaw Pact



Belgium threatened with a new political crisis

BY GILES MERRITT IN BRUSSELS

THE SPECTRE of another Belgian political crisis has been raised in Brussels by opposition inside the coalition Government to proposals that would reduce the country's deficit on public expenditure.

The francophone Socialist Party, which is a key partner in the six-party coalition headed by M. Wilfried Martens, is considering its position in relation to public spending cuts that might include a reduction in health benefits and tighter rules for unemployment benefit.

The Socialists, who have 31 seats in the 212-seat Belgian lower house, are to decide by next weekend whether they will remain in the coalition. If they leave, Belgium is likely to be faced with its thirty fifth political crisis in 40 years.

Although M. Martens could continue without the Socialists, it is likely that their defection would trigger a further general election only six months after he took office.

The Socialists' re-examination of their membership of the Government stems from proposals that are understood to have been discussed in Cabinet for reduced spending on social security. The question is closely linked to talks with the trade unions and employers on a wage moderation package. But trade union concern has been mounting recently over suggestions that the Government might this week use a royal decree to cut security benefits.

M. Martens hinted at such a move earlier this month when he announced measures to reduce Belgium's 1980 public sector borrowing requirement of Bfr 240bn (about £4bn) by Bfr 20bn.

Dutch industry picks up

BY CHARLES BATCHELOR IN AMSTERDAM

THE FORTUNES of Dutch industry improved again in the second quarter of this year, according to the central bank. Companies sold more and investment picked up.

Exports increased by 3 per cent in volume in the quarter compared with the first three months. Investment at home also increased as the construction industry recovered from the effects of the severe winter.

Private spending on the other hand was unchanged and has remained constant since the third quarter of 1978. Although the bank did not comment, this development will be welcome in view of its warning earlier this year that individual's spending and industrial investment were out of balance.

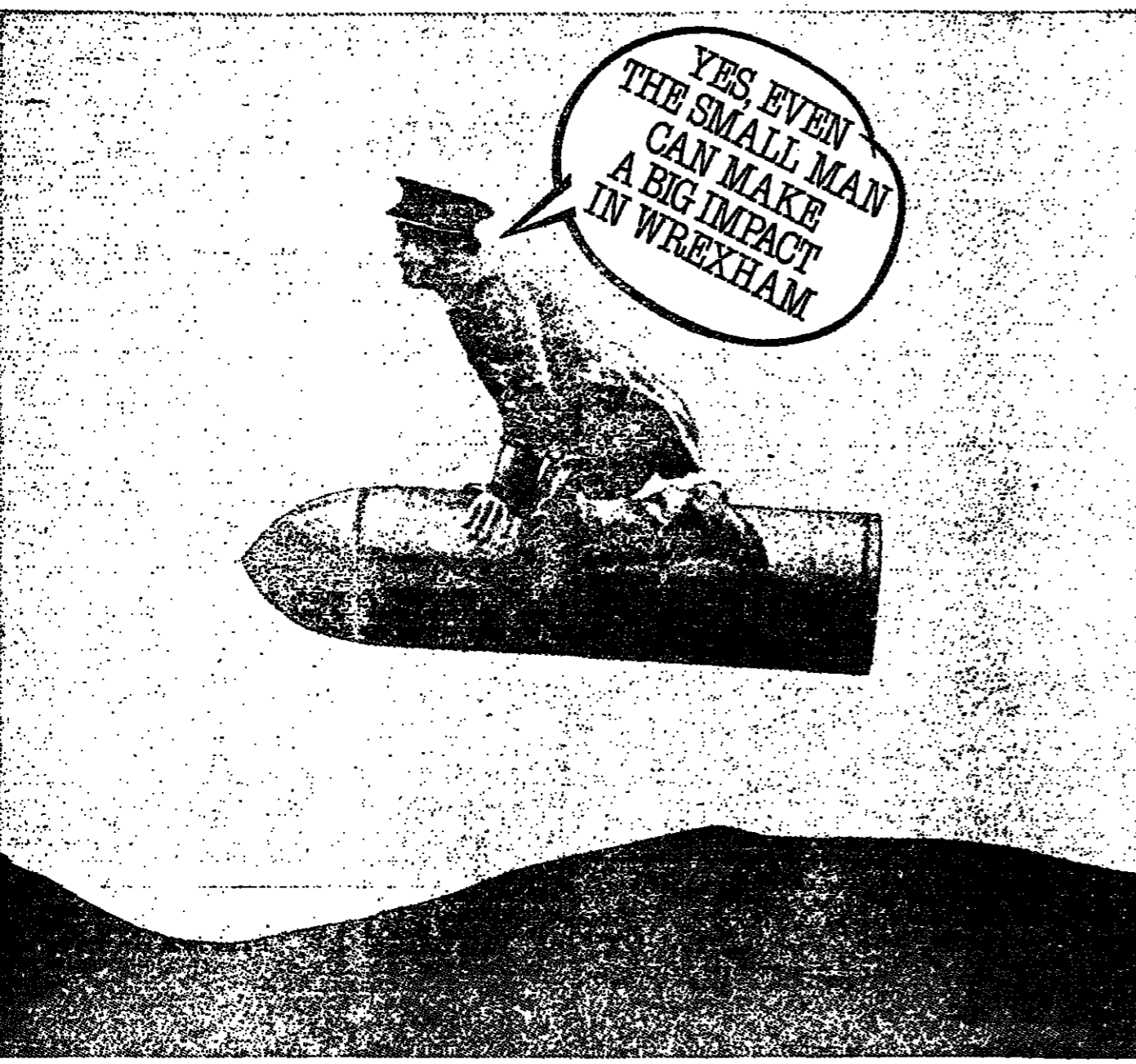
Industrial production recovered in the quarter in levels reached before the winter downturn and surveys of busi-

ness opinion revealed that orders and stocks were not far below those reported in periods of economic boom. While fewer companies complained about low demand, more said production was being hampered by labour shortages.

The central bank also said lending by the commercial banks was within the limits it has laid down, and, at times considerably below the 9 per cent increase allowed.

Consumer credit lending rose 16 per cent on an annual basis in the second quarter. This was slightly above the 15 per cent limit set for the year to March but well below 1978's 28 per cent increase.

FINANCIAL TIMES, published daily except Sundays and holidays. U.S. subscription rates \$365.00 per annum. Second class postage paid at New York N.Y. and at additional mailing centres.



It's not just the big boys that make a killing here in Wrexham. True G.K.N., KELLOGG'S, METAL BOX CO., CONTINENTAL CAN, E.R.F., JAEGER, G-PLAN, J.C.B. and TETRA-PAK are all appreciating the effect of a very conducive environment and between them they're investing over £100,000,000 in the Borough, but the incentives that we offer them are even more worthwhile to the small business.

Here are some of them:

- * Excellent industrial relations record
- * Rent-free periods in advance factories
- * Easy access to major markets
- * Special Development area and E.E.C. financial incentives
- * Welsh Development Agency assistance

And every month since 1974 a new project has commenced in the area.

So take the first step in recognising your own explosive potential, by sending for our colour brochure now:

Wrexham Maelor Borough Council

To the Chief Executive Officer, The Guildhall, Wrexham LL11 1AY, Clwyd, North Wales, U.K. or telephone R. J. Dutton or D. W. Jones or H. Pzibram at Wrexham (0978) 4611. Please send me details of industrial incentives at Wrexham.

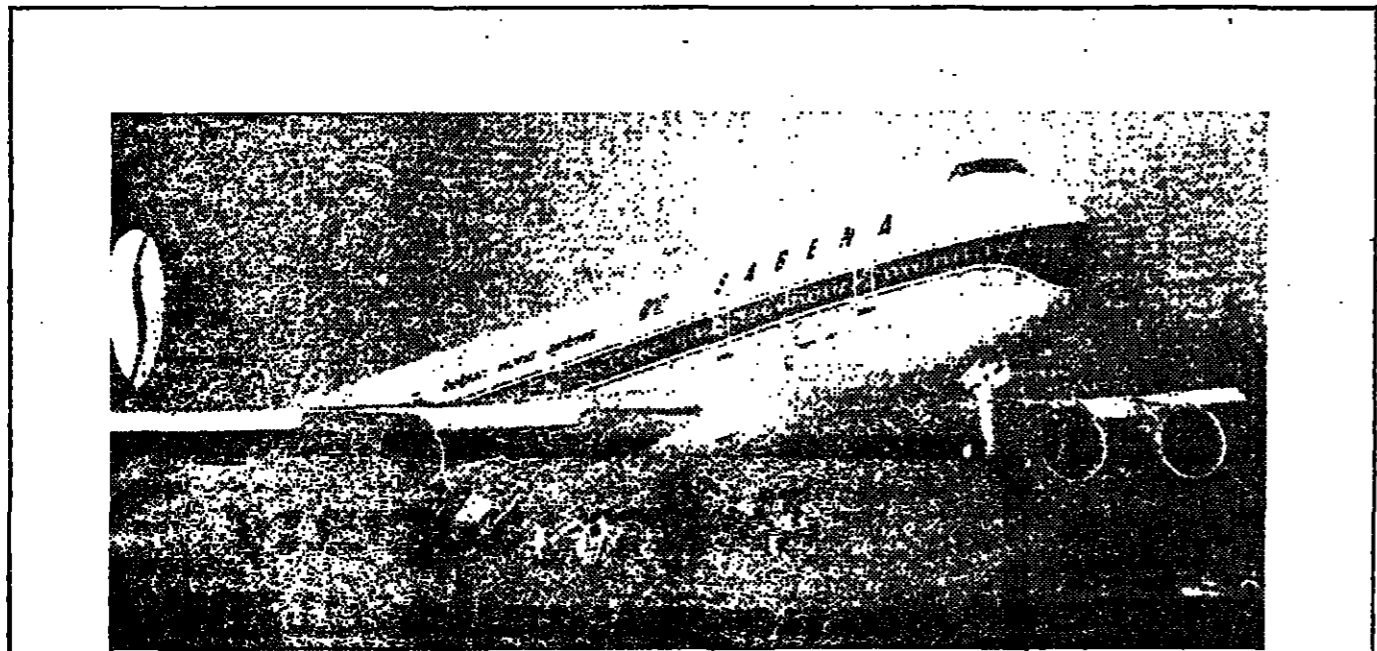
Name _____

Company _____

Address _____

Tel. No. _____

SPECIAL DEVELOPMENT AREA



Sabena's proposal

An unhurried airport at the centre of a busy international network

A privileged location. Sprawling, overcrowded airports are all too common in Europe. Brussels Airport is a welcome exception. Although centre of a vast international network, it maintains a human dimension by grouping all services within a single terminal, thereby eliminating bus transfers and long walks through endless corridors.

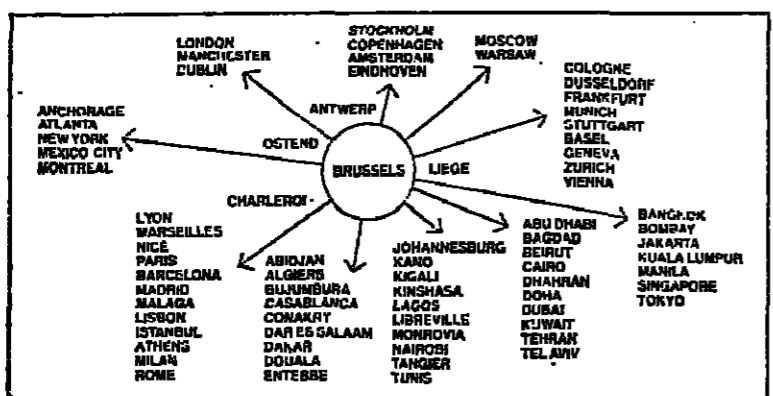
As the hub of Western Europe, Brussels Airport is geared to the needs of transit passengers, so crowds are

smaller, queues are shorter and baggage handling quick, reliable and efficient.

The Sabena network
Founded in 1923, Sabena the Belgian airline was already operating regular flights to Central Africa as early as 1925. Today, Sabena carries over 2 million passengers annually to some 75 destinations in more than 50 countries around the globe. From the UK, Sabena offers you 99 passenger and 17

cargo flights per week from London and Manchester to Brussels, Antwerp, Liege, Charleroi and Ostend. Brussels is also directly accessible from Birmingham and Edinburgh without having to pass through London.

Manchester-Brussels
This year we are proud to celebrate the 30th anniversary of our first scheduled flight to Manchester. On June 15, 1949, a DC3 "00-AUV" touched down at precisely 12.54 p.m. bringing the first 13 businessmen by air from Brussels. Today, Manchester is linked daily with Sabena's worldwide network.



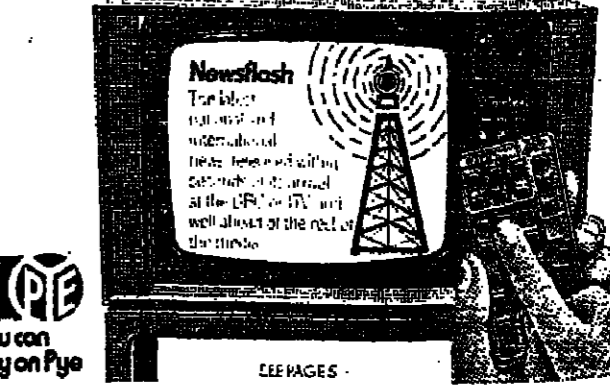
SABENA
belgian world airlines

Sabena and your travel agent are partners and would be happy to provide any additional information you may require.

Get the news as it happens. Switch on 'the electronic newspaper' from Pye

The latest national and international newflashes are broadcast on Teletext within seconds of their arrival at Ceefax or Oracle. With a Pye Teletext TV you're informed of the key news events well ahead of even the main TV news itself.

Teletext is the fastest news and information guide in the world. See a live demonstration as soon as possible. For the name and address of your nearest Pye dealer, write to Pye Teletext Department, Pye Ltd, 137 Ditton Walk, Cambridge CB5 8QD.



EUROPEAN NEWS

WARSAW PACT LEADERS IN EAST BERLIN FOR 30TH ANNIVERSARY



Grin faces on the rostrum as East Germany's military might rolls by. From left to right are: Mr. Gustav Husak of Czechoslovakia; Mr. Edward Giersek of Poland; Herr Willi Stoph, the East German Prime Minister; President Leonid Brezhnev; and Herr Erich Honecker, the East German President.

Brezhnev steals East Germany's thunder

BY ANTHONY ROBINSON IN EAST BERLIN

THE SOVIET President, Mr. Leonid Brezhnev, and his delegation flew back to Moscow yesterday, having effectively upstaged East Germany's 30-year anniversary celebrations by announcing what is being hailed here as a new "peace offensive."

Most other Warsaw Pact leaders hastened back to their respective countries soon after Sunday's military parade, which broke new ground in flaunting violation of Berlin's theoretical non-militarised status.

The anniversary celebrations took place in the strictest security. Uniformed and secret police were drafted in from the provinces, while much of East Berlin's population either left town for the weekend or stayed at home.

exact terms of which are not known. East German citizens assume, however, that they will become increasingly onerous as international prices rise. The 30th anniversary celebrations themselves were a highly organised demonstration of the faithful by the faithful and apparently for the faithful too.

Although the occasion was billed as the anniversary of the East German state, it appeared to be far more a party than a national one. Strong emphasis was placed on East German-Soviet friendship.

strong when he promised to withdraw up to 20,000 troops and 1,000 tanks from East Germany and offered to reduce the number of Soviet medium-range nuclear missiles in the western part of the Soviet Union provided NATO agreed not to station similar weapons in Western Europe.

The task of reviewing endless columns of goose-stepping troops in jackboots and traditional Prussian-style uniforms minus scuff helmet proved too much, however. He sat down while the modernised weaponry which so worries NATO trundled heavily past in clouds of blue smoke, and while helicopter gunships flew overhead.

Soviet offer on troops welcomed

By Roger Boyes in Bonn

THE West German Chancellor Helmut Schmidt, has welcomed the Soviet offer to reduce unilaterally its troops in central Europe, but is cautious about a Kremlin proposal to limit the numbers of its middle range missiles.

Commenting on President Leonid Brezhnev's weekend speech, Herr Schmidt said that arms talks with Moscow would have to take into account security needs of both East and West. It was not enough to limit the number of medium-range missiles — the danger came in the replacement of old weapons by new, more accurate ones (specifically the SS-20s), which were capable of carrying three warheads instead of one.

India's elder statesman J. P. Narayan, dies at 77

BY K. K. SHARMA IN NEW DELHI

MR. JAYA PARAKASH NARAYAN, who died at Patna in Bihar State yesterday morning of cardiac arrest, must have been a greatly disillusioned man because of the collapse just over two months ago of the Janata Party that he was instrumental in forming.

Mr. Narayan, who was 77 and known popularly as "J.P.", had been critically ill for some months at first suffering from a kidney disease he developed during his imprisonment by Mrs. Indira Gandhi during her emergency rule in 1975.

when it erupted in July and forced Mr. Desai to resign when the Janata Party, an unwieldy and unsuccessful merger of five disparate groups, broke up.

Yet in 1977, when the Janata ousted Mrs. Gandhi as Prime Minister, Mr. Narayan had been hailed as the "father of India's second independence." Many then wanted him to take up the role of a "people's tribune" — a leader out of office and above politics but an arbiter of disputes whether within the government or outside it.

Mr. Narayan declared a few months ago that the people should be grateful to the Janata Party for restoring their freedoms to them. But he added that it was up to them to complete the "total revolution" he had started by eradicating the twin social evils of the caste system and poverty that continue to plague India.

A true radical who never believed in the status quo, Mr. Narayan did not live to see a solution of India's main problems, nor any sign that efforts to solve them were being made.

To some confidantes he let it be known the "last hope for democracy in India," as Mr. Narayan described the Janata, had not been realised. He also hinted that the politicians who made up the Janata had failed to live up to the pledge they took to tackle India's problems when they were swept to power in March, 1977.

Many people found Mr. Narayan's concept of a total revolution unreal and nebulous and even inconsistent. Others questioned the practicability of some of his social and economic ideas.

But what was beyond dispute was his concern for, and faith in, the people of India. He did not consider them as an impersonal "mass" but as a community of individuals entitled not only to economic security but also to freedom, dignity and respect.

Migration urged for Pacific isles

BY DANIEL NELSON IN MANILA

A POLICY of emigration is advocated for the poorer South Pacific Islands in a report on agriculture prepared by an Asian Development Bank study group.

Real income growth is said to be possible only in Fiji, Papua, New Guinea and the Solomons, and to be unrealistic elsewhere. But no growth need not be synonymous with poverty, the report says, if migration gives people access to goods and services.

Western Samoa is to support its future population at the standards of living to which they currently aspire. For Kiribati (formerly the Gilbert Islands), the report says: "Continued economic growth from its own resources is impossible... external assistance in the form of budgetary aid may be necessary for a long period, perhaps indefinitely."

Demand for Danes to break ban on fishing

By Hilary Barnes in Copenhagen

DANISH fishermen's leaders are urging their members to be prepared to fish in the Norway punt box off the coast of Scotland in spite of a British ban.

The fishermen's Association has written to the Government proposing that the state should pay any fines imposed on Danish fishermen caught by the British, but the Government will not decide whether to go along with this plan until after next Tuesday's meeting in Brussels between Danish and British officials and the EEC Commission.

Mr. Laurids Toernæs, the chairman of the Association, said that the fishermen cannot afford to wait more than a day or two for a decision. "We must be ready to fish in the punt box this week," he said.

Mr. Svend Jakobson, the Fisheries Minister, said at the end of last week that after the British decision to ban all fishing in the punt box—a decision which the Danes regard as illegal—it will be difficult for him to argue that the Danish fishermen should stay out of the punt box.

The British decision, hits the livelihood of over 100 trawlers and their crews, which are dependent at this time of year on Norway punt.

Mr. Kent Kirk, a skipper from the West coast port of Esbjerg and a member of the European Parliament claims that each trawler risks a loss of income over the next three months of about £70,000 as a result of the British decision. Meanwhile, the Social Democratic party is forecast to win 34.2 per cent of the vote—compared with 37 per cent in 1977 in the October 23 general election, according to a Gallup poll published at the weekend.

The extreme left-wing parties: the Communists, the Left Socialists and the Socialist People's party stand to gain considerably, picking up together 15 per cent of the vote, compared with 10.3 per cent at the last general election in 1977.

On the right wing, the Liberals, who for the past year have been in coalition with the Social Democrats, are forecast to move up from 12 per cent to 13.3 per cent. However, they and the three parties with whom they hope to form a government after the election—the Conservatives, the Centre Democrats and the Christian People's party—may gain only a combined vote of 23.2 per cent, compared with 27.9 per cent last time.

Finland looks East and West for nuclear power

BY LANCE KEYWORTH IN HELSINKI

FINLAND will take over management responsibility from the supplier of its second nuclear power station this month, although the plant has been supplying the national grid with electricity since early this year.

In 1980, when all four projected nuclear power plants should be on stream at maximum feasible production, nuclear power will account for about 30 per cent of the total electricity supply of the country, compared with 15 per cent this year.

Its share of total energy production, converted into million tonnes of oil equivalent, will then be 12 per cent, compared with 3 per cent in the current year. These ratios gain significance when it is borne in mind that 70 per cent of the country's total energy requirements today must be imported. Wood and peat excepted, Finland has no indigenous solid fuels and its hydro-power resources have been almost fully exploited.

Third countries

Finland is the only country in the western world which has both eastern and western nuclear reactors. Finland is alone in buying its uranium from Canada and having it enriched in the Soviet Union, and probably the only country which is in line to co-operate with the Soviet Union in the building of nuclear power stations in third countries.

The early future in the 1960s over Finnish nuclear energy plans died down when years of uncertainty ended with the order in 1970 of a Soviet 440 MW pressurised water reactor from Technoprom-export, now Atomenergopost. This was followed a year later by the order for its twin. Known as Loviisa I and II after the town on the south coast, 60 miles east of Helsinki, near which they are sited, the plants were ordered by Imatran Voima Oy (IVO), the state power utility.

In 1972, the TVO power company ordered a 660 MW boiling water reactor from Asea-Atom AB of Sweden. This was to be built at Olkiluoto, on the south-west coast. An identical plant was ordered in the following year, and these two are known as Olkiluoto I and II. TVO is a consortium of 22 industrial and power companies from the public and private sectors in which each sector has a 50 per cent shareholding. IVO has a 13.5 per cent interest.

Loviisa I and II together are estimated to have cost about FM 2bn (£247m) at present-day money values. This is considerably more than the original estimates owing to delays, cost escalations, etc. The so-called "give-away" Soviet financing for its own share of the Loviisa contract, a FM 250m credit (1970 values) at 2.5 per

cent interest for 20 years, has prevented the final cost from going even higher. Loviisa I was delivered about 10 months behind schedule and Loviisa II will be just over a year late, largely because of Atomenergopost's (AEE) problems in delivering the heavy components, including the reactor pressure vessel. An additional complication with Loviisa II arose this year when faults were discovered in the anti-corrosion shield in the pressure vessel.

AEE did not consider the defects serious, but IVO insisted on repairs which are now in progress.

Olkiluoto I also had its problems, notably a fire in the construction phase and, very recently, a radioactive leak in the cooling system due to misinterpretation of the operating instructions. This was put right in a matter of days and the plant is in production again. Olkiluoto II is on schedule and loading has already begun. The total cost of the Olkiluoto project is given as FM 4.8bn (£592m) including cost escalations and the investment in fuel re-loaders. The Finnish share of the value of the total contract with Asea-Atom is reckoned to be between 40-50 per cent. For the Soviet project the Finnish input is given at around 70 per cent.

A third flurry of alarm followed those over the radioactive leak and the faults in the corrosion shield. This was the thesis worked out on a computer by the Finnish State Institute for Technical Research that dangerous overheating was possible in Loviisa I, IVO and AEE convinced the watchdog of nuclear safety, the Finnish Institute of Radiation Protection, that this was not possible in practice, and the plant was never shut down.

Possible rewards

The unique co-operation between East and West has brought its problems, but may also have its rewards. The Russians are known to be seriously interested in exporting nuclear power turnkey projects to countries outside the East bloc. Finland has expressed an interest in participating in such projects. After the experience amassed at Loviisa, the fields in which IVO is in a position to cooperate are construction planning, site construction, the construction itself, instrumentation, air conditioning and soft water systems for cooling.

Libya could well be the first country in question, Iraq later. An additional advantage for Finland is that its builders and consultants are already working on major construction projects in those countries. No firm decision on enlargement of the Finnish nuclear programme is likely before 1982, but a decision in principle has been taken to order a 1,000-MW unit from AEE.

Advertisement for SUPER BRS trucks. Features a cartoon character pointing to a map of the UK and the text: 'The right truck in the right place at the right time!'. Includes a list of services like box vans, dropside, refrigerated, etc.

Advertisement for SUPER BRS trucks. Includes a photograph of a truck and the text: 'Success in road transport means having the right truck for the job in hand. Box vans, flats, dropside, refrigerated, insulated, articulated - distribution vehicles, rental, contract hire, haulage, breakdown vehicles - BRS operate over 9,000 of them. In the right place means where you want them - your place or ours, your customer's or suppliers. And at the right time means just that BRS can help you get it right, wherever you are.'

OVERSEAS NEWS

Japan, after the Liberal Democratic Party's general election disappointment, is assessed by Charles Smith and Richard Hanson

Dismay on stock market Prime Minister 'mystified' by setback at Ohira's poor showing

THE TOKYO stock market reacted badly to the failure of Mr. Masayoshi Ohira's Liberal Democratic Party to achieve an absolute victory in Sunday's lower house election, with the Nikkei Dow index plunging after a largely brilliant pre-election performance.

The stock market's chagrin over Mr. Ohira's showing will probably be short-lived (yesterday's Y50 drop in the index to Y6,496 came on rather low volume) because the market is basically still strong.

The economic problems that Mr. Ohira will be facing in coming months, however, appear unlikely to disappear quickly. The lack of a strong vote of confidence in his party's administration could make handling those problems efficiently a very difficult task.

Among the problems Mr. Ohira's Government will face, oil supplies, inflation and reform of the Government's finances are perhaps the most pressing.

The Government has so far skilfully staged-managed the oil crisis stemming from the cut-off of Iranian supplies last December. Public panic has been avoided and apart from minor inconveniences like less

air-conditioning during the summer and closed petrol stations on Sunday, Japan has maintained a calm which belies its absolute dependence on imported oil.

Prices however, have already shot up sharply, particularly for heating fuels, demand for which has just begun to increase. It is possible that Japan will face both a supply and price crunch this winter. The Government has been very quiet about just how much oil Japan can be assured of importing. A stable parliamentary majority for Mr. Ohira would have made swift handling of a worsening oil situation easier, if not less painful.

It has been suggested that the oil crisis this time was postponed until after the election.

The government has committed itself to policies aimed squarely at controlling inflation caused by rising oil prices by tightening credit and curbing government spending. Wholesale prices have soared as a result of higher oil prices, but the consumer price index has been remarkably stable at around 3 per cent annually.

This rate is optimistically expected to rise only to about 5 per cent. At the same time,

the Government hopes to sustain a moderately rapid pace of economic growth while fighting inflation. This will require sustained confidence in the private sector which, according to pre-election surveys, has planned a considerable amount of spending for new plant and equipment.

Mr. Ohira will have to work hard now to retain the confidence of the private sector.

One factor contributing to Mr. Ohira's election woes appears to have been his advocacy early in the campaign, of the need for new tax burdens. This would help the Government bring its bloated finances into line, a necessity if Government deficits are to be eliminated as a source of inflationary pressure. The national budget this year is funded nearly 40 per cent by huge floats of national bonds.

Opposition to the idea of a tax increase, came not only from opposing political parties but from within the Liberal Democratic Party itself. It now appears likely that legislation on tax reform will be delayed. The party's margin in the lower house is not strong enough to control the key budget committee.



Mr. Ohira: difficult times ahead

THE RULING Liberal Democratic Party's failure to win more than a bare majority of seats in last Sunday's election to the lower house of the Japanese Diet is expected to weaken seriously the position of Mr. Masayoshi Ohira, the Prime Minister, as Party Leader—even though it may not lead to his resignation.

Mr. Ohira, who has led the Party for just under a year, was personally responsible for dissolving the Diet in September, a year ahead of the constitutional deadline, and appeared confident throughout the three-week campaign that the Party would win an increased majority.

He professed himself to be "mystified" by the result in a post-election press conference, suggesting only that campaign organisers must have been over-confident and that "top people" in the Party (presumably including the five ex-Cabinet Ministers who were defeated) had "not tried hard enough."

One of Mr. Ohira's predecessors as Party leader, Mr. Takeo Miki, who was himself forced to resign after the LDP did poorly in the 1976 general election, suggested yesterday that the Prime Minister should give serious thought to accepting responsibility for election management. Mr. Ohira may also be obliged to give some important posts to adherents of rival intra-party

signation and no other party leader has spoken up in any thing like such explicit terms.

One reason why Mr. Ohira is likely to be able to keep his job is that there is no obvious successor in sight—as there was when Mr. Miki was pushed out of office in 1976, or when Mr. Ohira succeeded Mr. Takeo

factious when he reforms his Cabinet next week.

The allocation of Cabinet posts, however, promises to be an extremely delicate matter given that Mr. Ohira's personal following is now one of the largest, instead of being the smallest of the four "main" factional groupings making up

Political analysts believe that co-operation between the four small centre-left parties, which helped to swing votes away from the Liberal Democrats on Sunday, could be an even bigger factor in the upper house poll. Voting for the upper house takes place party in a "national constituency" where the entire electorate votes for a single list of candidates and party in local multi-member constituencies with from one to three seats. It is in the latter that centre party electoral alliances could prove particularly damaging to Mr. Ohira's party.

Failure to win in the July upper house elections could well cost Mr. Ohira his chance of being re-elected as party president at the end of 1980 (when his two-year term of office expires).

At present, however, the Prime Minister lacks an obvious, or even remotely eligible, successor.

Party	Seats won Sunday	Won in 1976 Election	Strength at time of September dissolution
Liberal Democratic	248	249	249
Japan Socialist	107	123	117
Komeito	57	55	54
Japan Communist	39	17	19
Democratic Socialist	35	29	28
New Liberal Club	4	17	13
Social Democratic Federation	2	None	3
Independents	19	21	7
Total 511 Seats			

Fukuda in the premiership last year.

The immediate consequence of the election setback is likely to be the dropping of Mr. Ohira's close associate, Mr. Kunikida Saito, from the key post of party secretary general (the office which carries direct responsibility for election management). Mr. Ohira may also be obliged to give some important posts to adherents of rival intra-party

Rhodie sentenced to six years' jail

BY BERNARD SIMON IN JOHANNESBURG

DR. ESCHEL RHOODIE, the former secretary of the South African Department of Information, who masterminded the Vorster Government's propaganda war, was yesterday sentenced to six years' imprisonment for fraud.

Dr. Rhodie's trial was the culmination of the so-called Muldergate scandal, which involved the abuse of some R55m (about £7m) of public funds for the financing of clandestine projects aimed at winning friends for South Africa. The scandal has already led to the retirement from public life of former Prime Minister, Mr. John Vorster, and the disgrace of the man who was at one time favourite to succeed him, Dr. Connie Mulder.

The main point at issue in Dr. Rhodie's trial was whether the R83,000 which he drew from the Information Department's secret funds was legitimately paid to anonymous collaborators or whether he used the money for personal purposes.

In his evidence, Dr. Rhodie claimed that it had been departmental practice for senior officials to use personal funds to pay agents, and then to be reimbursed by the department. He said that some of these collaborators—several of whom had since died or left the country—had refused to issue receipts or sign any documents.

Delivering judgment, Mr. Justice Theron described Mr. Rhodie's version of events as a "made-up story and unconvincing." He said that Dr. Rhodie should have advised his superiors of these unusual financial arrangements.

The court convicted Dr. Rhodie on five charges of fraud involving R63,000, but found him not guilty on two charges of theft. Dr. Rhodie is appealing against the conviction.

The trial, which followed Dr. Rhodie's extradition from France in August, produced several new disclosures concerning the Information Department's clandestine attempts to improve the Nationalist Government's image in South Africa and abroad.

Those included evidence that Mr. Vorster's official visit to Israel in 1976 was part of a secret project launched by Dr. Rhodie, known as the "Jewish programme," which was co-ordinated by a prominent Jewish architect in Pretoria. Dr. Rhodie testified that part

of this campaign was to get Jewish backing for the state-funded newspaper, The Citizen, on the basis of the newspaper's support for Israel "through thick and thin."

Among others who received funds from the Department of Information was the Committee for Fairness in Sport, which launched a worldwide advertising campaign to promote the Government's sports policies.



Dr. Eschel Rhodie: appealing against conviction

The question now is whether Dr. Rhodie's conviction marks the end of the Muldergate saga. There is no doubt that most of the South African public have become bored with the information affair. Moreover, there is a widely held view that, even if Mr. Botha and Mr. Horwood knew more about the goings-on in the department than they have cared to admit, they are doing a sufficiently good job now to deflect pressures on them to resign.

Some influential observers feel, however, that damaging facts about Muldergate may still be hidden from the public eye. In a speech last week, Mr. Rex Gibson, editor of the Sunday Express newspaper, which was instrumental in exposing Muldergate, argued: "We still have not heard the full story."

He added: "We don't know whether some people have been made scapegoats and others allowed to go unscathed. And we don't know anything about the 50 or 60 projects from the bad old days which are still being carried on."

Two major Iranian banks make changes at the top

BY ANDREW WHITLEY

THE Iranian Government has named new heads for two big banks, replacing two of the dwindling corps of senior professional bankers left in Iran. Further changes are expected as the clergy-dominated Revolutionary Council tightens its grip on the economy.

The new head of Bank Mellat, by far the country's largest bank, is to be Hossein Seyyed Almasi, a 48-year-old career banker who has handled the affairs of the small Darius Bank and the much larger Bank of Tehran since the revolution. Educated in France, his appointment will reassure anxious foreign bankers that there will be continuity of policies at Bank Mellat.

Dr. Almasi replaces Mr. Jalil Shoraka who left Tehran recently to take up the post of chairman and managing director of the Iran Overseas Investment Bank in London, at his own request. The Revolutionary

Council has criticised the Government for allowing him to leave the country.

The other change announced yesterday by banking officials in Tehran involves the head of the country's main development bank, the Industrial and Mining Development Bank. Mr. Reza Moghadam, the man appointed to run the IMDB after the nationalisation of the banking system in July, has been temporarily replaced by his deputy, Mr. Bagher Baradar.

Reports from Tehran said yesterday the most likely replacement for Dr. Almasi at the Bank of Tehran—likely to be one of four or five major units after a forthcoming merger of nationalised banks—is General Ezzatollah Montaz, the first head of the Gendarmerie, a provincial police force, after the overthrow of the Shah. General Montaz is a conservative figure who was forced into retiring by more radical elements.

WHO HAS MORE CARS THAN GODFREY DAVIS?

NOBODY!

WHO ELSE HAS A CHARGE CARD THAT GUARANTEES YOU A CAR?

NOBODY!

WHO ELSE BUT GODFREY DAVIS HAS OFFICES ON RAILWAY STATIONS?

NOBODY!

WHO HAS MORE PLACES WHERE YOU CAN PICK UP OR DROP OFF A CAR THAN GODFREY DAVIS?

NOBODY!

Forget for a moment the flannel and flattery that car hire companies seem to indulge in.

Ask yourself which car hire company gives you a better service than Godfrey Davis—we think you'll come back with the very simple answer: Nobody.

Nobody has more cars than us. So we're more likely to have a car when you want one.

Nobody has as many offices as we have all over the country—we have over 175.

So we're likely to be closer to your point of departure. And closer to where you want to drop the car off. (They don't have to be the same place).

Nobody else has facilities on railway stations. We have them actually on over 70 Inter-City stations (so you can step off the train straight into one of our cars).

And nobody else guarantees a car to their charge card holders or British Airways Shuttle passengers.

It's because of facts like this, that we find more and more people keep coming back to us. And if you think that's just a bit of flannel on our part, do you know who's got more customers than Godfrey Davis?

You've guessed it. Nobody.

Godfrey Davis

MORE CARS. MORE OFFICES. MORE CUSTOMERS. LESS FLANNEL.

To book one of our facts or other quality cars, ring 01-825 7700. Or consult Yellow Pages.

مكتابن الاجل

Carter aims big guns at Florida

BY DAVID BUCHAN IN WASHINGTON

THE WHITE HOUSE is bringing up its biggest guns and speeding up federal grants to Florida to try to deliver an early blow to the presidential ambitions of Senator Edward Kennedy.

Yesterday Mr. Harold Brown, the Defence Secretary, became the latest in a succession of Cabinet heavyweights to visit the Sunshine State.

Obviously he was there to review the Key West naval station that is to become the headquarters of a new Caribbean task force, created by President Jimmy Carter in response to the Soviet combat presence in Cuba, but equally important, to wave the Carter flag in Florida.

At stake is the selection next Saturday of some 900 delegates to a state Democratic Party convention next month which will conduct a straw poll between Presidential candidates.

The result will not be binding on Florida delegates — the state's official Presidential primary in March will decide that.

But both the Carter and the "Draft-Kennedy" campaigns in Florida are making this Saturday's delegate selection a major test of strength.

Mr. Carter hopes at the very least to slow the momentum of the pro-Kennedy movement inside the Democratic Party, before he officially announces his re-election bid on December 4.

To this end, Mr. Carter is using all the weapons in his armoury of an incumbent President.

In the past month or so there has been a spate of announcements of federal grants to the state in such areas as housing, transportation and health. Usually coinciding with the visit there of a cabinet officer, or the Vice-President.

Last month the Government announced a \$1.1bn loan guarantee to a Florida electric co-operative, although the request had been made only in July.

Although there is no indication that Florida will actually end up with more than its fair federal share, the loan guarantee was one of several instances in which the processing of requests by Florida for federal aid has been speeded up.

Brazil plans £30bn electricity investment

By Diana Smith in Brasilia

THE BRAZILIAN Government is to invest Cr 2 trillion (million million) (£30.7bn) between 1980 and 1990 in electricity capacity.

It will invest in 18 hydroelectric schemes, complete 32 schemes under way, and build three nuclear power plants, as well as coal-fired power stations, raising capacity from the present 25,000 MW to 75,500 MW.

The Government's electricity agency, Eletronbras, which drew up the plan — Plan 95 — said demand would grow by 12.7 per cent a year until 1985, slacken to 8.7 per cent a year from 1985 to 1990, and drop to 7.2 per cent a year from 1990 to 1995.

Hydroelectricity now supplies about 55 per cent of Brazil's energy. The Itaipu dam on the Parana River — the largest in the world — will start producing power in 1982. It will add 12,000 MW to installed capacity.

Plan 95 specifically mentions only three nuclear power plants by 1990, with a total capacity of 3,100 MW. This appears to confirm that the Government is slowing its original timetable of buying four reactors from Kraftwerk Union of West Germany with an option for four more.

Guyana seeks talks with IMF on loan facility

BY MUHAMMAD HAMALUDIN IN GEORGETOWN

GUYANA IS being forced to re-negotiate an extended financing facility of about \$41m arranged with the International Monetary Fund last June, because of a series of economic setbacks caused by political agitation, bad weather and industrial unrest.

Announcing this, Dr. Ptolemy Reid, Deputy Prime Minister, gave no details, but conceded that the bargaining would be hard and protracted.

The fund had set a ceiling of \$54m on net domestic assets of the Bank of Guyana, and £138m on net credit by the banking system to the public sector — both to the end of last month — as well as requiring that external payments arrears to the end of this month should not exceed £7m.

Giving a report after a half-yearly review of the economy, Dr. Reid said the original export and import targets have been scaled down, the former from £179.6m to £168m, the latter from £200m to £190m.

Exports for the first half of the year earned only £74.4m, while imports totalled £87m.

In terms of commodities, the country has again scaled down its sugar target for the year, this time to 300,000 tons.

After a 50,000-ton shortfall on the first crop which reached only 110,000 tons, the target had been reduced from 360,000 tons to 330,000 tons.

Dr. Reid reported that there were 87 work stoppages in the industry in the first half, resulting in a loss of 33,421 man-days. He hoped the second crop, now in full swing, could produce the 190,000 tons needed to meet the revised projection.

In the case of bauxite, hit by a lengthy strike two months ago, the 1979 target is being reduced overall by 18 per cent. The target for dried bauxite is being lowered from 1.14m tons to 950,000 tons, for calcined bauxite from 737,000 tons to 620,000 tons, for alumina from 255,000 tons to 190,000 tons, and for alumina hydrate from 20,000 tons to 12,000 tons.

Dr. Reid explained that the industry had 41 strikes in the first six months of the year, resulting in 40,000 man-days lost, against a background of relatively favourable prices.

For rice, the original projection is being reduced by 30 per cent, from 210,000 tons to 147,000 tons — mainly because of adverse weather and shortage of machines and equipment.

Dr. Reid gave no figures for the country's foreign reserves, but said they were in a "very critical" position. The Government was proceeding with some 300 development projects, costing well over £100m.

Dr. Reid blamed the economic shortfalls particularly on "the adverse impact of the attempts of certain subversive political elements to destabilise our economy."

"The effect of that effort, abortive and self-destructive though it proved in political terms, was to weaken the performance of the major industries on which we are still heavily dependent."

The report is expected to inject some sobriety into Guyanese politics, where the Government of Mr. Forbes Burnham, the Prime Minister, has weathered a brief political storm and remains firmly in control.

The political agitation, mainly caused by the Working People's Alliance Party, has given way to a period of sustained calm and there is little doubt that Mr. Burnham will be concentrating on injecting some buoyancy into the economy.

The Government is unlikely to brook any wildcat stoppages, especially in the export sectors, particularly when the country could be headed for general elections.

The elections, due last year, were postponed for 15 months after a constitutional referendum, to enable the drafting and adoption of a new constitution.

Miller warning to Senate on aid

BY OUR WASHINGTON CORRESPONDENT

U.S. STANDING with Third World countries would be severely damaged if the Senate fails to eliminate restrictions attached by the House of Representatives to money for the World Bank and other international lending agencies, Mr. William Miller, the Treasury Secretary, has warned.

The Administration hopes the Senate in a floor vote due today will not follow the action of the House last month. This action barred the lending of U.S. money by the World Bank and five other regional development banks to six countries: Vietnam, Cambodia, Laos, Angola, Cuba and the Central African Republic.

Mr. Robert McNamara, the World Bank president, reiterated at the bank's annual meeting in Belgrade last week that he could not accept such a blacklist attached to the U.S. contribution.

In the case of the World Bank's soft loan affiliate, the International Development Association, contributions by other donor countries are tied to those of the U.S. Thus as Mr. Miller warned Congress, other contributions "would be lost as well."

The same battle has been fought for the past two years and in both cases the Administration, with Senate help, has won through. But conservative opponents of aid in the House, unhappy at seeing U.S. aid channelled through multilateral agencies over which they have little control, have put up more of a fight this year. The Administration's worry is that they may find support in the Senate.

Another source of dispute is the size of the U.S. contribution to the international agencies. The House cut President Carter's original request down to \$2.55bn, while the Bill which the Senate is due to vote on contains \$3.16bn.



Mr. Robert McNamara

Delays hit NY insurance exchange

BY OUR NEW YORK STAFF

PREPARATION FOR starting New York's insurance exchange have hit further obstacles. It may now not open for business until mid-1980, according to reports here in New York.

It was due to open this autumn, and to start trading in January. But there is still controversy over how it will function alongside the New York free trade zone for re-insurance which was established more than a year ago.

Another hurdle, according to Mr. Martin McConnell, president of Stewart Smith, the U.S. organisation within the London-based Stewart Wrightson broking group, is a crucial decision awaited from the Internal Revenue Service. It has yet to agree that individual members of the New York exchange can be treated in the same way as insurance companies which are members.

Moreover, there are several practical considerations delaying the exchange's opening. A president has yet to be elected, and the exchange still has no premises from which to trade, despite suggestions that New York's world trade centre or a building in Jan Street was to be its home.

Another inhibiting factor is the growing softness of the international insurance market. The U.S. market, like London, is suffering from excess capacity, with premium rates at very low levels. On top of this, some progenitors of the exchange are worried about the economic recession facing America and its effects on insurance business. The U.S. property/casualty industry had nearly a \$100m net underwriting loss in the first half of 1979.

Plans for establishing similar insurance exchanges in Chicago and Florida, which are generally felt to be subject to the success or otherwise of New York's new market.

All this will perhaps be welcome news to Lloyd's. Lloyd's internal problems apart, it is suffering from over-capacity and soft rates, particularly in non-marine business, which poses the biggest threat to London if the New York exchange is successful.

Companies like Stewart Smith, founding broker-member of the New York exchange, can do little but wait. There is a feeling that the wait could be quite long.

U.S. companies happy with outcome of pay talks

NEW YORK — Despite sizeable wage increases won by car workers, most U.S. companies are negotiating labour contracts they find acceptable, the Conference Board said in a report on labour relations.

Of the 78 companies surveyed, about half negotiated the most recent wage and benefit packages either at or below the company's target, the study said.

On non-wage goals, such as paid vacations and employee work assignments, the study said management reached 88 per cent of its goals.

A company's ability to reach its goals depended to a good extent on the degree to which the company is unionised, the survey showed. It said some 55 per cent of the most heavily unionised companies settled above their targets, compared with only 28 per cent of the least unionised firms.

Audrey Freedman, the Conference Board's labour relations specialist, noted management's research before bargaining appears to have resulted in negotiations that contained few if any surprises.

A company's vulnerability to strikes was an important factor in keeping labour contracts within management targets, particularly in the area of non-wage issues, the study said.

It said companies which bargain on a plant-by-plant basis, rather than company-wide, are much better able to take the single plant strikes and blunt their effects.

Reuter

Castro 'to address UN General Assembly soon'

HAVANA — President Fidel Castro will visit the UN soon, for the first time since 1960, Cuba's official daily newspaper, Granma, said yesterday. While he will inform the General Assembly of the views of the non-aligned movement, of which Cuba is President.

President Castro will report on agreements reached at the summit conference of the 96-member movement in Havana last month, the newspaper added.

He is also likely to criticise the U.S. for increasing its military activities in the Caribbean, and for its surveillance of Cuba, diplomats said.

President Carter announced the measures last week in response to what Washington said was the establishment of a Soviet combat brigade in Cuba.

The Cuban President has said Soviet troops are only in Cuba to train Cuban soldiers. The official Cuban Press has already denounced the increased U.S. military presence.

Officials in Havana feel Washington sought to discredit Cuba's claim to non-alignment by portraying Soviet military advisers as a combat unit.

The non-aligned summit's Havana declaration, on which further discussions have been held among members since the conference, will form the basis of President Castro's report to the UN.

The document, which will guide non-aligned policies over the next three years, emphasises that the movement should not link itself with any power bloc, and should be strictly independent.

Reuter

Nuclear protest

SEABROOK, NEW HAMPSHIRE — Police and National Guard troops using dogs and teargas pushed back about 500 anti-nuclear demonstrators who entered the construction site of a nuclear power plant here.

A National Guard spokesman said about 12 demonstrators were arrested in the incident late on Sunday, and one was taken to hospital.

Reuter

Pye announce 'the electronic newspaper'

<p>FT INDEX</p> <p>The fastest City news, plus the latest FT Index, foreign exchange prices, money and market rates, commodities, grain & stock prices.</p>	<p>Weather</p> <p>Short and longer term weather forecasts for the whole of the British Isles — regional and national. Essential for farmers and travellers.</p>	<p>Garden Advice</p> <p>Expert advice on what you should be planting, pruning, harvesting, preparing or treating this week.</p>	<p>Today's Road Conditions</p> <p>Conditions, road works, delays, traffic volume, detours and weather, advice for all main roads in the country.</p>
<p>Commodity Prices</p> <p>Metal and soft commodities updated twice daily.</p>	<p>Current Best-sellers</p> <p>An up-to-date report on the current best-selling books, fiction and non-fiction, with a brief synopsis of each.</p>	<p>Newsflash</p> <p>The latest national and international news, televised within seconds of its arrival at the BBC or ITV, and well ahead of the rest of the media.</p>	<p>Theatre Guide</p> <p>Who's starting in what and where, plus a brief review of each show, and the box office telephone number.</p>
<p>Latest Scores</p> <p>The sporting headlines, plus the latest scores and results of every major sport of the day.</p>	<p>Today's Racing</p> <p>All the wins and places are on Teletext seconds after each race (dogs and horses) plus starting prices, non-runners etc.</p>	<p>Foreign Travel News</p> <p>Invaluable information for anyone travelling abroad. Includes snow conditions, flight cancellations, local weather etc.</p>	<p>Stand-by Availability</p> <p>Laker's and British Airways latest flight times and seat availability. News of airport conditions, flight cancellations, and delays.</p>

A quiet revolution has taken place in British Television. The arrival of 'the electronic newspaper'.

Even as you read, 650 pages of up-to-the-minute news and information are being televised by the BBC (CEEFA) and ITV (ORACLE) on a service called Teletext, 'the electronic newspaper'.

From 6.45 am through to midnight, items are updated within seconds of the arrival of news, making 'the electronic newspaper' the hottest information service around.

A British invention that leads the world.

How it can improve your leisure.

After a hard day, or week, keeping up with the latest happenings in the world of business (even tougher without Teletext), 'the electronic newspaper' can even help you relax.

'Which play could we see?' 'What can we do with the children?' the answers, along with best food buys, current best-seller lists, gardening tips,

the Top 30, foreign holiday guide, gallery guide, even quizzes and games are all there on Teletext.

What it offers the sports fan.

Watch the main match with the results of others flashed on screen as they happen. Or get the test score while watching something else.

You can even arrive home to a list of the day's scores and results, and

even the latest horse racing results as quick as the local betting shop.

Why you should rely on Pye.

The World's most advanced AX tube plus the World's most sophisticated Teletext decoder.

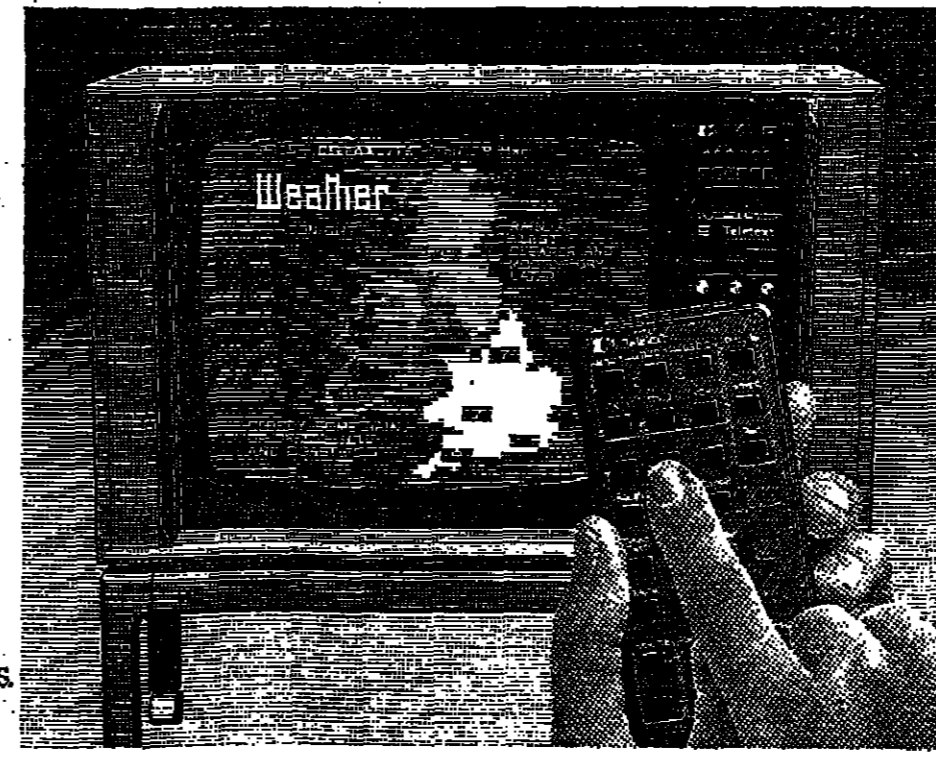
That's what Pye 26" and 22" sets offer. Everi small print stays sharp as you enlarge a portion of text by remote control, or pre-programme to flash the latest newflashes on the screen.

You can even pre-set an alarm call and tell time by the atomic clock.

You have to experience it to believe it.

You'll be amazed at the service, the range of information that Pye Teletext sets provide in addition to great colour viewing. And you can see it at your Pye dealer. But be warned.

You'll wonder how you ever did without it. For the name and address of your local Pye dealer write to Pye Teletext Department, 137 Ditton Walk, Cambridge CB5 8QD.



You can rely on Pye

WORLD TRADE NEWS

China signs phone deal with France

By Terry Dodsworth in Paris
A FRANCO-CHINESE telecommunications agreement has been signed in Paris under which the French Post and Telecommunications Organisation (PTT) will help with the development of the Chinese system.

This is claimed to be the first agreement signed between the Chinese and a national telecommunications organisation.

Outline understandings have been reached in a number of areas.

The first of these in the field of electronic telephone exchanges, followed by radio communication systems and the Transpac data transmission system.

Fujitsu of Japan will establish its first overseas semiconductor plant in San Diego, California. AP-DJ reports from Tokyo. The company said it is planning to spend about ¥2.2bn (£4.5m) for the plant, scheduled for completion in December 1980.

Peking trade centre move

By Richard C. Hanson in Tokyo
CHINA is expected to re-propose Japanese participation in building a trade centre complex for Peking when a high-level business group visits this week.

Mr. Yoshihiro Inayama, chairman of Nippon Steel and head of the Japan-China Long-Term Trade Consultation Committee, is leading the visit. The group is also expected to consult with a team of Japanese Government officials now in China.

Late UK spares hit airline

BY DANIEL NELSON IN MANILA

DELAYS IN deliveries of spare parts by 10 British companies have forced Philippine Airlines (PAL) to make cuts in its domestic service with effect from next Thursday, Mr. Roman Cruz, the airline's chairman, told a news conference yesterday.

Mr. Cruz said the airline was down to two weeks' supply of critical spare parts, and that it would take between four and six months to get inventories back to normal levels. Flights had to be reduced now in order to preserve capacity for the Christmas peak. Seat availability will be reduced by 19 per cent a week. British-made parts are required for almost all the 140 domestic flights which PAL operates daily using BAC 1-11s.

When asked whether the delivery delays would encourage PAL to buy non-British aircraft in future, Mr. Cruz said that the recent problems would not be a "critical factor" in the study of domestic fleet expansion and modernisation which was currently under way. "Even the Americans are not immune from strikes," he added.

A decision on new aircraft purchases could mean savings of up to \$30m, or equal to the cost of engines and spares on the first five A-310s for Air France. Gates Learjet Corporation, of Atlanta, is considering raising production of its Longhorn 50 Series of executive jets by 25 per cent, to five aircraft a month, to meet rising demand.

Mr. Cruz said later that since a 35 per cent April 1 fare increase, PAL had been making "a modest profit" on domestic flights for the first time in 14 years.

The airline — undergoing a major reorganisation which pushed up its debt in 1978 from Pesos 360m (£22m) to Pesos 620m (£38m), lost an estimated Pesos 20m (£12.6m) on its international operations through the grounding of DC-10s earlier this year.

Philippine Airlines has reduced its twice-weekly service to Canton and Peking to one flight a week because of lack of passengers.

Pratt & Whitney strengthens Airbus ties

BY MICHAEL DONNE, AEROSPACE CORRESPONDENT

PRATT AND WHITNEY Aircraft of the U.S., part of the United Technologies group, has won a \$70m contract from Iberia of Spain for JT-9D engines for the airline's fleet of nine A-300 European Airbuses, and for its further five aircraft on order.

The deal means that Pratt and Whitney has considerably strengthened its position as an engine supplier to the European Airbus Industrie consortium, against General Electric of the U.S., whose CF6 series engines have powered most of the A-300s built and delivered so far.

Both these U.S. engine companies are also fighting for the contract to power the new 200-seat A-310 version of the Airbus ordered by Air France. The airline has five A-310s on firm order, with an option on a

further 10 aircraft. Unconfirmed reports from Paris have suggested that Air France would prefer Pratt and Whitney JT9D engines for its A310s. Mr. Cruz denied taking any decision, however, and stresses that the whole matter is still under review by the airline and the French Government, which is expected to make a decision before the end of this month.

In its bid to win the engine contract for the A-310s, Pratt and Whitney is reported to have offered to sub-contract up to 30 per cent of the work on all future A-310 engine orders to French companies, and to move its JT9D service centre from West Germany to France.

It is also said to have offered to overhaul free of charge the 77 Pratt and Whitney engines on the airline's 17 Boeing 737 jets.

French and U.S. industry officials suggest that these con-

cessions could mean savings of up to \$30m, or equal to the cost of engines and spares on the first five A-310s for Air France.

Mr. B. S. Stillwell, senior vice president, marketing, said current plans call for production rising to four jets a month by mid-1981, with a further rise envisaged to five aircraft a month by end-1981. Primary factor in the decision will be availability of engines for the jets from Garrett AirResearch.

part of the Tokyo Round trade package, which is designed to overhaul the existing General Agreement on Tariffs and Trade, GATT, which regulates most of the world's foreign trade.

The code as now agreed allows developing countries not to accept the value of imports as stated on the invoice, if they have reasonable grounds to suspect that the invoice is inaccurate.

The text will then become

Customs code agreed

BY BRIJ KHINDARIA IN GENEVA

DEVELOPING COUNTRIES have ended opposition to an international code regulating methods to value imports for customs purposes.

An agreement in principle was reached here between developing and industrialised countries and all governments have been given one month in which to approve the final draft text.

The text will then become

LORD TRENCHARD'S VISIT TO JAPAN

Invest in Britain programme to be stressed

BY JOHN ELLIOTT, INDUSTRIAL EDITOR

THE FIRST major indication that the British Government intends to continue with the inward investment policy and incentives developed by its predecessor will come next week when Lord Trenchard, Minister of State for Industry, starts a 10-day visit to Japan aimed at encouraging companies to set up plants and joint ventures in the UK.

He will be travelling on a trip organised by his department's Invest in Britain Bureau, whose activities have recently been scrutinised by Sir Keith Joseph, the Industry Secretary.

The bureau's interventionist activities are somewhat out of line with Sir Keith's dislike of State involvement in industry, but they have been given the go-ahead because Sir Keith accepts that Britain must compete for international projects.

At the same time, however, Sir Keith has ordered a study of the cost effectiveness of the bureau and of other promotional agencies in the English regions, funded by his department, which compete with each other to attract industry to the UK. Work of other organisations such as new town corporations will also be taken into account, and a study might be done later

of the effectiveness of the Scottish Development Agency, which this week is expanding its promotional work in the U.S.

Lord Trenchard will be going to Japan with two main objectives.

One is to discover the potential for future Japanese projects in the UK, now that the dust has settled on the row two years ago about Hitachi setting up a television plant of its own in the north-east.

Since then Hitachi has been welcomed as a partner with GEC, and the idea of joint ventures has been given a major boost by the Honda link-up with BL. Possible investments and joint ventures will, therefore, be on the agenda for talks.

But Lord Trenchard will also be trying to persuade the Japanese that, even though his Government wishes to stand back from industrial affairs whenever possible, it does welcome foreign investment. He will say that the UK Government is trying to create an attractive macro-economic and industrial environment, and that selective investment scheme's type of special aid are continuing. He will however add in care-

fully chosen words that the Japanese must not expect his Government to copy the habit of its predecessor and publicly applaud every foreign project.

In other words, the Government believes that companies should make their own commercial decisions, and it is consequently not prepared to underwrite all those decisions, either politically or financially.

The special importance of this message is that Japanese companies are used to working closely with their own Government, receiving its blessing or disapproval for what they do. They therefore, usually felt at home with the stance of Mr. Alan Williams who was Lord Trenchard's predecessor in the last Labour Government.

Mr. Williams and his colleagues believed in State intervention in industry, so there was a political as well as an economic dimension to their inward investment activities.

Despite its different political approach, the Conservative Government has now shown its acceptance of the economic realities of international competition by continuing with selective as well as regional aid, by honouring the last Government's financial backing for a

Yugoslavia atom plant delayed

BELGRADE—Yugoslavia has blamed Westinghouse Electric for delays in the construction of the country's first atomic power station.

The Yugoslav news agency Tanjug said the project has been delayed 2½ years. Westinghouse is providing essential installations. According to Tanjug, "the principal reason for the postponement is the irregular forwarding of technical documentation, as well as late deliveries of major installations."

An official statement is expected this month.

The power station is to be built near Krb, Slovenia. It was to have been operational in the early 1980s, but Tanjug said installation and activation of the first reactor will not be until 1983.

In Pittsburgh Mr. Paul Jones, director of international communications for Westinghouse Power System, subsidiary of Westinghouse, said: "There have been unforeseen delays due to difficulties associated with the first-time construction of a nuclear power plant in Yugoslavia."

AP-DJ

Nigeria oil bid fails

THREE major Japanese trading concerns, C. Itoh, Mitsubishi and Marubeni, have failed in negotiations with the Nigerian Government for Nigerian crude oil supplies. Reuter reports from Tokyo. The companies sought some direct deals to secure part of Nigerian crude supplies totalling about 300,000 barrels a day following Nigeria's takeover of British Petroleum's stake in BP Nigeria last July. The negotiations were said to have failed over prices and quantity.

Chrysler to build \$110m small engines plant in Mexico

DETROIT—Chrysler plans to build a \$110m plant in Mexico to produce four-cylinder engines beginning in late 1981.

Chrysler's Mexican subsidiary said the plant would be able to assemble about 270,000 engines a year, primarily for the front-wheel-drive small cars it plans to sell in the U.S. starting in the early 1980s.

Additional engine capacity is important for Chrysler because it is relying heavily on long-term purchase contracts with Volkswagenwerk and Mitsubishi Motors to supply its current and future cars with small, fuel-efficient engines. Already, production of Chrysler's fast-selling sub-compact Omni and Horizon models has been curtailed

because of a shortage of four-cylinder engines.

By 1981, Chrysler expects to assemble about 850,000 front-wheel-drive small cars a year in the U.S. requiring four-cylinder engines. A further increase is scheduled as additional models are reduced in size and converted to front-wheel drive.

To try to meet that future demand, Mr. Harold K. Sperlich, Chrysler's executive vice-president of engineering and product development, confirmed that the company is continuing to talk to Mitsubishi and Volkswagen about the possibility of extending the purchase contracts into the late 1980s or setting up a joint venture to manufacture engines.

Brazil changes decision over phones scheme

BY RIK TURNER IN SAO PAULO

THE BRAZILIAN subsidiary of the Japanese Nippon Electric Company (NEC) is to be allowed to participate in the construction and supply of stored programme controlled telephone exchanges (SPCS) in Brazil.

The announcement, in an official note from the Communications Ministry in Brasilia, represents a reversal of the Brazilian Government's decision in February.

Then, it was announced that the SPC contracts would go to joint ventures formed with Brazilian companies by the

other two telecommunications multinationals taking part in the bidding, the Swedish Ericsson and the American Standard Electric.

The reasons for NEC's apparent disqualification in February were legal rather than technical.

NEC appealed against the decision, and it was revealed at the time that they felt confident of a review of their case with the change of government in March. The company will now have a 30 per cent share of the market, 40 per cent shares going to the other two joint ventures.

UK INWARD INVESTMENT PROJECTS

Company	Project	Date announced	Approx. cost	Approx. grants	Jobs provided
Ford	Erica project	Sept. 1977	£63m	£14m	2,500
Rank Toshiba	Joint venture — TV sets	Aug. 1978	£19.2m	£1.95m	2,000
Roche Products	Vitamin C	Nov. 1978	£140m	£45m	450
GEC/Hitachi	Joint venture — TV sets and audio	Dec. 1978	Hitachi contribution £17.5m	None	2,000
GEC/Fairchild	Microelectronic devices	Feb. 1979	£16m	£7m	1,100
Solzer	Centrifugal pumps	July 1979	£14.4m	£7.2m	700
National Semiconductor	Microelectronic chips	Aug. 1979	£45m	(EIB loan) £12m	2,000
Dow Corning	Silicones	Sept. 1979	£135m	£34m	125

NEW YORK
SAVE £72*
REAL ECONOMY IS RESERVASEAT

Our Roundtrip Economy fare to New York really is £72 less than anyone else's.

Reserve your seat both ways any time prior to departure. Full airline service and roomy comfort of the wide body DC10. Scheduled daily flights.

You're much better off taking a Laker Economy flight to New York — £72 to be precise!

ROUND TRIP LONDON-NEW YORK

LAKER ECONOMY RESERVASEAT	OTHER AIRLINES LOWEST ECONOMY FARE	YOU SAVE
£329	£401	£72

*If you don't want meals you can save a further £5.

Advance Purchase Excursion fare £169 round trip. Standard Skytrain Service £70 one way. Seat availability call 01-828 7766.

Tickets and reservations at the Skytrain Service Sales Office at Victoria Station or Gatwick Airport.

LAKER Skytrain
See your Travel Agent or call 01-868 9300.

Take the direct line to profit in Scotland

Now there's a direct route to profitable industrial growth in Scotland.

It's the direct line through the Scottish Development Agency—a new source of finance for industrial projects.

No matter where you're based—in Scotland and wishing to expand, or thinking of Scotland as a manufacturing base, the SDA can meet your capital requirements.

Set up to stimulate Scotland's industrial development and to create opportunities for growth, the SDA can deal with all enquiries and information on industrial investment.

If your business is set for expansion, the SDA can bridge some of the gaps in the availability of money that other sources do not always meet.

For example, the SDA is one of the few sources of venture capital, putting equity and loan finance behind new products and advanced technology. Or it may be money to help develop the next stage of your company, to improve your capital structure—or modernise your plant.

All this, plus government incentives, could be very profitable for you. Just match our criteria and you could be in business.

When we say money isn't everything, we mean it. We have other help available to set you on the right track. Advice and assistance for businesses large and small, new project evaluation, marketing, production and financial management. We can provide a factory on site or purpose built to your needs.

Just take the SDA line to Scotland.

The express way to profit.

Head Office, 120 Bothwell Street, Glasgow G2 7JP
Tel: 041-248 2700 Telex: 777600
London Office, 17/19 Cockspar Street, London SW1Y 5BL
Tel: 01-839 2117/8

كمان الناصح

Engineering group to cut 500 jobs

BY RHYS DAVID, NORTHERN CORRESPONDENT

MATHER AND PLATT, the Manchester engineering group, has told unions that it plans to reduce its labour force by about 500. The company blames lack of orders, over-manning and the competitive problems posed by the high rate of sterling.

The engineering union strikes had made conditions even more difficult, the company said yesterday.

Most of the jobs (390) will go at Park Works, Newton Heath, where 2,600 workers make fire fighting equipment and pumps.

The Globe Iron Works, a small foundry and workshop at Radcliffe, will close, with the loss of 60 jobs. Another plant at Radcliffe, Bradley Fold, which makes textile finishing machinery and food processing and canning equipment, will lose 60 of its 650 jobs.

Shortage of skilled labour in Midlands

BY LORNE BARLING

A SHORTAGE of skilled workers is restraining the growth of industrial companies in the West Midlands, according to a survey carried out by the Birmingham Chamber of Commerce.

The study showed that tool-makers, vital to the engineering industry, were most difficult to find, followed by draftsmen, design personnel, and sheet-metal workers. Overall, companies made it clear that recruitment difficulties were restraining output.

Housing starts fall sharply in August

BY ANDREW TAYLOR

WORK BEGAN on 18,100 new houses and flats in Great Britain in August—the lowest monthly total since February.

Figures produced by the Department of the Environment showed that housing starts in August were almost 11 per cent lower than a year earlier. Housing completions totalled 16,700, down almost 20 per cent from a year ago.

Leaf from Mughal album fetches £18,000

SOTHEBY'S started its autumn week of Islamic sales with an auction of oriental miniatures, manuscripts and Qajar lacquer which brought in £99,390. The best price was the £18,000, about double the estimate, paid for a leaf from a Mughal album, a miniature of about 1590, showing a young prince relaxing during a hunting expedition, attributed to La'.

SALEROOM

BY ANTONY THORNCROFT

An illustration to a manuscript, also Mughal and produced in about 1600, showing Prince Salim hunting, made £10,000. An indication of the rising prices for Indian art is the £1,500 which secured an Indian Stork, a watercolour of

Mersey Docks to build £8.5m Liverpool berth

BY RHYS DAVID

MERSEY Docks and Harbour Company is to spend £8.5m on a new berth at Langton Dock in Liverpool in spite of its pre-tax loss of £2m in the first half of the year.

The berth is for Combi-vessels, which carry containers and general cargo. The investment, which will be financed by borrowings, is needed, says Sir Arthur Petersen, the chairman, to keep the port abreast of future trends.

The changeover to container ships throughout the world is now thought to be slowing down. A number of countries in the developing world, in particular, are expected to rely on Combi-vessels to meet their

trading needs over the next 20 years, rather than changing completely to container vessels. The Combi-vessel berth — the project for which has been given by Mr. Norman Fowler, the Transport Minister, is expected to be in operation in four years.

The scheme involves quayspace able to take four ships, a 22-acre open area, new sheds, offices and workshops, and will be capable of handling half-a-million tonnes of cargo a year. The port's losses are being blamed on external factors and disguise what appears to have been a partial trade recovery over the past six months, with general cargo showing its first

upturn for some time. Operating revenue in the first half was £23.36m roughly the same as in the previous year, on which an operating loss of £962,000 compared with a profit of £1.78m in the same period last year, was incurred.

The company estimates that the transport strike in January and February cost more than £1.5m. The other major drain was voluntary severance payments, a total of £1.2m as a result of a reduction of more than 500 in the labour force. Prospects for the second half again look to be difficult with more redundancies — possibly 750—needed to bring the labour force into line with demand.

Welsh steel plants 'risk closure'

BY ROBIN REEVES, WELSH CORRESPONDENT

EVERYONE of the five British Steel Corporation profit centres in Wales, including Llanwern and Port Talbot, is at risk of closure unless it moves into profit, according to Mr. Peter Allen, managing director of the corporation's Welsh division.

Emphasising that BSC was taking seriously the Government's demand for the corporation to balance its books by March, Mr. Allen said that

every management group now had a responsibility to get its individual works into profit. "And if we do not get them into profit then I think we will have to live with the consequences. I think it inevitable that some closures will take place," he said in a radio interview.

The plants at risk included— as well as Llanwern and Port Talbot steelworks—the tinsplate group and the composite works

within the Associated Products Group. He rejected the suggestion that he was simply indulging in a management ploy to frighten the workforce. The British taxpayer had funded the steel industry for long enough. It was time to question whether the country could afford to continue subsidising the industry now that its capital investment programme was nearly complete.

'Realistic rate grant promised

By Paul Taylor

THE GOVERNMENT will set "realistic" cash limits on the additional rate support grant to local authorities to cover inflation in 1980-81, and once the limits are set there will be no more cash. Mr. Michael Heseltine, the Environment Secretary, told local government leaders yesterday.

His assurance that the limits would not be artificially low came at a meeting of the Consultative Council on Local Government Finance attended by Ministers and representatives of local government associations.

The amount of the grant, to be announced next month, will be a major factor in determining size of rate increases next year.

Local authority associations have been concerned that cash limits might be unrealistic. Mr. Heseltine's announcement was "warmly welcomed" by the local authority leaders at the meeting, including Sir Gervas Walker, chairman of the Association of County Councils.

The associations however did tell the Secretary of State that they could not predict the service-by-service effects of the five per cent 500m cut in council expenditure next year already requested by the Government.

Motor part industry may have a 'Neddy'

BY JOHN ELLIOTT, INDUSTRIAL EDITOR

A "LITTLE NEDDY" for the motor components industry may be set up next year by the National Economic Development Council once it has decided the future of 17 sector working parties which have not been doing effective work.

This emerged yesterday after the NEDC had decided to abolish seven Little Neddies and sector working parties set up under the last Government's industrial strategy exercise and to give a further 17 of the groups six months to develop effective programmes of work or face abolition.

The idea of setting up a Little Neddy for the motor industry has been mooted several times in recent years, but has not been backed by the companies involved.

Mr. Eric Varley, Secretary for Industry in the last Government, was chairman of a tripartite group which brought together senior people from the industry's companies and unions. But it achieved little and has not met since Sir Keith Joseph became Industry Secretary.

Yesterday Mr. Geoffrey Chandler, director general of National Economic Development Office, said motor components were one large area where a sector working party or Little Neddy might be useful. But he stressed that no formal proposals had yet been made.

He was speaking after a meeting of the NEDC had reaffirmed support for the working party system. The Government and the CBI now both want the groups to concentrate on productivity, competing with imports, import penetration and maker-user relationships.

The 17 groups given six months to prove their worth include the electronics, Little Neddy and sector working parties covering automation and instrumentation, computers, and telecommunications. The Industry Department is interested in streamlining their work, perhaps through mergers.

In mechanical engineering, five sector working parties covering constructional steelwork, diesel engines, fluid power, industrial trucks, and textile machinery are among the 17, partly because some of those involved have not worked together well.

The remaining groups in the 17 are: the rubber processing working party which has failed to tackle effectively the tyre industry's problems; the wool textiles, Little Neddy whose pace of work has slackened in recent months; the foundry and distributive trades Little Neddies; and sector working parties covering petrochemicals (which has had some over-investment policies), pharmaceuticals, and industrial electrical equipment.



LOS ANGELES
SAVE £175*
REAL ECONOMY IS RESERVASEAT

Our Roundtrip Economy fare to Los Angeles really is £175 less than anyone else's. Reserve your seat both ways any time prior to departure. Full airline service and the roomy comfort of the wide body DC10. Scheduled daily flights. You're much better off taking a Laker Economy flight to Los Angeles — £175 to be precise.

LAKEE ECONOMY RESERVASEAT	OTHER AIRLINES LOWEST ECONOMY FARE	YOU SAVE
£507	£682	£175

*If you don't want meals you can save a further £9.

Advance Purchase Excursion fare £243 round trip. Standard Skytrain Service £94 one way. Seat availability call 01-828 7768. Tickets and reservations at the Skytrain Service Sales Office at Victoria Station or Gatwick Airport.

LAKEE Skytrain
 See your Travel Agent or call 01-668 9300.

Inter-City.
 It's the difference between hearing what he says and seeing what he means.

You can't shake hands on the phone. When you meet face to face, shake hands and present your case, there may seem to be little difference with what you could have said by letter or telephone. The difference is far more likely to be in the answer. Yes. Instead of no. Often it pays to do business in person and the best way to travel is by Inter-City, the quick, reliable way to go from city centre to city centre.

With Inter-City you are free from the stops, the starts, and the stress of a road journey. You can prepare for the business of the day in comfort. And freshen up before you arrive. All without wasting a second. When your business is finished, you can relax on the train home. With much more chance of having something to celebrate than if you had stayed at your desk.

Inter-City
 Have a good trip!

UK NEWS

CEGB in £10bn coal deal

BY MAURICE SAMUELSON

THE CENTRAL Electricity Generating Board has agreed to buy at least 75m tonnes of British coal per year for the next five years as part of its efforts to reduce the amount of oil burned in power stations in England and Wales.

The deal, worth £10bn at present prices, and an estimated £14bn on the basis of inflation, has been described by the National Coal Board as "easily the biggest coal deal ever concluded outside the Communist bloc." It could also mark the end of the traditionally stormy relations between the two State-owned industries.

It was signed yesterday afternoon at the Coal Board by Mr. Malcolm Edwards, the NCB's chief marketing director, and Dr. Trevor Broom, the CEGB operations director tomorrow. NCB officials will present the details to leaders of the National Union of Mineworkers.

The agreement hinges on the

CEGB's pledge to keep its prices within the prevailing rate of UK inflation. The formula for calculating this, linked to the retail price index, was finally settled last Friday by Mr. Edwards and Mr. Fred Bonner, the CEGB's deputy chairman.

Although the agreement is in the form of an understanding rather than a legally binding contract, both boards are firmly committed to it. It obliges the NCB to do its utmost to supply 75m tonnes a year, keeping any price increases within the national inflation rate. The CEGB has agreed not only to pay for the coal but to accept delivery, however full its stock yards.

By being able to show miners that there is now a guaranteed market for greater coal output, the NCB hopes that it will encourage better productivity and improve industrial relations.

Sir Derek Ezra, NCB chairman, commented: "This means

our pits can go ahead and raise production to the knowledge that we can sell the coal."

The assurances on price rises are intended to increase the CEGB's incentive to buy British, rather than cheaper foreign produced coal. It will still be able to buy abroad—it has about 3m tonnes on order from Australia and the U.S. for 1980-1981—but only on the understanding that this does not jeopardise its UK purchases.

Mr. Glyn England, chairman of the CEGB, said the CEGB would continue to rely on UK coal to meet the greater part of its needs "if prices stay in line with UK inflation."

He added: "We want the coal industry to be strong and viable and have no doubt that coal as well as nuclear power has a vital role to play in meeting the nation's demands for electricity."

The 75m tonnes a year purchases will help the CEGB to

exceed last year's consumption, 75.5m tonnes, a rise of 5m tonnes over 1977-78 and 8m tonnes more than in 1975-76.

The deal also means that the CEGB will have to supply the NCB with more than last year's 69.1m tonnes, which fell short of the expected level of 72m tonnes. The shortfall was due partly to the bad winter weather and industrial action by train crews, as well as to inadequate production.

However, the NCB is confident of reaching the 75m tonnes target. Its task is made easier by the fall in demand from the

two boards report that after a major effort, and co-operation with British Rail, supplies are so far on target for this year. The supply of 75m tonnes this year has been achieved by depleting the Coal Board's stocks. Production from Britain's mines will need to be increased if the Board is to continue to supply at the same rate.

'More jobs' plea for disabled

Financial Times Reporter

MR. JAMES GOULD, vice-chairman of the Scottish Confederation of British Industry, emphasised yesterday a need for employers to provide more opportunities for disabled people.

He was opening a travelling "Fit for Work" exhibition, mounted on a train, organised by the Manpower Services Commission, at Glasgow. It portrays the problems and potential of disabled workers.

Mr. Gould said that the commission had placed 5,900 in jobs in Scotland, and 411 learnt new skills.

"In the last year in Scotland 1,975 disabled people used employment rehabilitation centres while employment aids and help in necessary building operations in places of employment were provided for a further 750 people."

But there was room for more opportunities for the disabled, and "we the employers must face up to our responsibilities more than we have done in the past."

The disabled's problems should be a routine part of personnel function, he said. Independent research showed that the disabled worker tended to be more loyal, more punctual and more reliable than others.



Mr. Harold Macmillan, the former Prime Minister, polishes the nameplate of the locomotive named after him. To the right, at the Euston unveiling ceremony, is Mr. Norman Fowler, the Transport Minister. The engine's first task was to haul a Conservative Party-chartered train to Blackpool.

Callaghan begins battle to restore his authority

BY PHILIP RAWSTORNE

MR. JAMES CALLAGHAN today begins his fight to re-establish his authority in the Labour Party after the reversals of last week's conference.

The Shadow Cabinet is to meet at the Commons to discuss its approach to the forthcoming

inquiry into party organisation and finances.

Mr. Callaghan and his colleagues will demand representation on the inquiry, whose report—to be submitted to next year's conference—is likely to have a decisive influence on the party's future.

A meeting of Labour MPs is expected soon after the Commons reassembles later this month to determine the main demands that they will put to the inquiry and to prevent any further undermining of their position.

Dr. David Owen, former Labour Foreign Secretary, said last night that the real battle for democracy in the Labour Party was now starting in earnest.

"So far we have had a power struggle under the guise of democracy," he told a party meeting in Hornsey. "Now the inquiry will have to face the real issues."

Basic issues

The parliamentary party wanted representation on the inquiry and on the National Executive Committee and greater involvement in policy-making both when in Government and when in Opposition, Dr. Owen said.

There was also little doubt that Labour MPs would vote for a parliamentary committee.

Similarly, the individual member of the party should be given the right to a postal ballot in the selection or re-selection of their candidate or MP, in the choice of their constituency representative, possibly from the regions, to serve on the national executive," he said.

Dr. Owen said it was time the party used the technology of

computerised membership to involve all its members in these basic issues.

Individual membership of the party would be worthwhile and worth paying for if it carried with it the power to vote.

"We have had a penny-farthing party structure for too long."

Dr. Owen suggested that public funds could be used to finance internal party elections in the same way that the Conservative Government proposed to make them available for trade union elections.

Mr. Callaghan leaves London tomorrow for an eight-day visit to the Middle East. The Leader of the Opposition will spend three days in Egypt where he will have talks with President Sadat and other leading politicians before flying direct to Israel for another three days of talks with Prime Minister Begin, other Israeli Ministers and officials of the Israeli Labour Party.

On October 15, Mr. Callaghan will be guest of honour at the Balfour Dinner given yearly in Tel Aviv. Accompanied by his wife, Mr. Callaghan will then go on to Jordan for a meeting with King Hussein before returning to London on October 18.

Hair spray cans 'dangerous'

A WARNING about the "dangerous state" of some Italian V05 hair spray aerosols has been issued by Mrs. Sally Oppenheim, Minister for Consumer Affairs. The cans, about five years old, were made by L. Manetti—H. Roberts et Cie and labelled in Italian.

Argos cuts prices by 10%

BY DAVID CHURCHILL, CONSUMER AFFAIRS CORRESPONDENT

THE ARGOS discount stores chain, a subsidiary of BAT Industries, yesterday launched a major price cutting campaign to win back some of the sales lost after the Budget. It also seeks to capture a share of the anticipated increased consumer

spending this month through tax rebates.

Argos is reducing by 10 per cent the prices of 173 popular branded products—ranging from electrical goods to jewellery—in a promotional package worth about £300,000.

It is the first time that Argos,

which gives customers a catalogue listing prices of the 2,000 different items stocked, has reduced its published prices during the life of a catalogue.

Argos has printed 2m copies of a special supplement to its full catalogue which list the price cuts.

Credit limit

THE GOVERNMENT will remove an anomaly which had imposed a £1,000 limit on the cash value of goods bought by running-account credit transactions effective October 29. Such transactions include store credit accounts and some credit card schemes.

An order amending credit control legislation was laid before Parliament yesterday by Mrs. Sally Oppenheim.

We had to know how conditions in South America and Africa affected world coffee prices before we could arrange multi-million dollar pre-export and import financing for the sale of Brazilian and Colombian coffee in the U.S. and Canada. It was just our cup of tea.



For Marine Midland Bank, this kind of transaction is all in a day's work. We're an international network of bankers doing business in the largest money centers in the world, for the largest corporations in the world, all over the world. So wherever you need us, count on us. You'll get the response that's right for you.

MARINE MIDLAND BANK

New York City, Buffalo, Miami, Beirut, Bogotá, Buenos Aires, Caracas, Frankfurt, Hong Kong, Jakarta, London, Madrid, Manila, Mexico City, Nassau, Panama, Paris, Rio de Janeiro, Rome, São Paulo, Seoul, Singapore, Sydney, Tehran, Tokyo, Toronto.

Immediate investment opportunities in the U.S. Contact Mellon Bank.

Mellon Bank's London office is your direct line for opportunities in the U.S. Not only can we provide you with the intelligence on the enormous investment potential in the U.S., but we can offer you expert advice to help you tap that potential.

Contact Richard M. Siefert, Vice President, 15 Trinity Sq., London, England. Telephone: (01) 488-2434. Telex: 885962.

Mellon Bank, N.A.



WE, THE LIMBLESS, LOOK TO YOU FOR HELP

We come from both world wars. We come from Korea, Malaya, Aden, Cyprus... and from Ulster. From keeping the peace no less than from war we limbless look to you for help.

And you can help, by helping our Association, BLESMA (the British Limbless Ex-Service Men's Association) look after the limbless from all the Services. It helps, with advice and encouragement, to overcome the shock of losing arms, or legs or an eye. It sees that red-tape does not stand in the way of the right entitlement to pension. And, for severely handicapped and the elderly, it provides Residential Homes where they can live in peace and dignity. Help BLESMA, please. We need money desperately. And, we promise you, not a penny of it will be wasted.

British Limbless Ex-Service Men's Association

Labour relations 'good' in U.S. Scottish plants

BY RAY PERMAN IN NEW YORK



Sir William Gray, Scottish Development Agency chairman (second from left) on top of the 50-storey building at 9 West 37th Street, New York, where the agency's new office is located. With him are (left to right) Mr. Ian Gray, head of the New York office, Mr. John Woodman, also of the New York office, and Mr. Jim Reid, the agency's San Francisco representative.

U.S. COMPANIES with plants in Scotland generally have good labour relations, with 90 per cent reporting no strikes in the past 18 months. This is one of the main findings of a survey carried out by PA Management Consultants for the Scottish Development Agency, which is beginning a promotional tour of five American cities in New York today. The survey, which covered 85 plants, attempts to counter the impression abroad that Scotland suffers perpetual strife between workers and management and that production is frequently disrupted by stoppages. About 95 per cent of the companies interviewed, which included all the large U.S. groups, said they did not need to budget for any time lost through disputes. Some 62 per cent reported no loss of production time at all as a result of strikes in the past five years. Of the rest, the average time lost was less than one day a year per employee. Disputes in other companies, such as component suppliers or in nationalised industries, had a minimal effect of production. Nearly one in four of the plants able to make an international comparison with other branches in the companies was either strike-free, or ranked in the top 10 per cent of relatively trouble-free concerns. Other questions in the survey show that labour turnover is low in American-owned factories, with absenteeism averaging 7.2 per cent. Most plants had flexibility agreements and 83 per cent of managements judged the attitude of their work force towards work to be either good or very good.

Although some American managements resist unionisation, two-thirds of those in Scotland are unionised and nearly all determine pay levels through a single set of annual negotiations. Criticism of unions by managers was muted. Sir William Gray, chairman of the Scottish Development Agency, who opened the SDA's new office in New York yesterday, said: "Britain's industrial relations record is painted very black abroad, but the facts show that most plants are totally strike-free and where stoppages do occur, the effect on production is generally minimal. The high technology industries have an excellent record, particularly in electronics, instrument engineering and metal manufacture which have been completely strike-free."

Disputes in other companies, such as component suppliers or in nationalised industries, had a minimal effect of production. Nearly one in four of the plants able to make an international comparison with other branches in the companies was either strike-free, or ranked in the top 10 per cent of relatively trouble-free concerns. Other questions in the survey show that labour turnover is low in American-owned factories, with absenteeism averaging 7.2 per cent. Most plants had flexibility agreements and 83 per cent of managements judged the attitude of their work force towards work to be either good or very good.

Curry's launches colour TV rentals

BY JOHN LLOYD

CURRY'S the electrical retail chain, yesterday, launched a colour rental service—Carousel Colourhire—based on 63 Curry's branches in the south east of England. The company plans to make the service national if the regional chain is a success. Curry's has 478 branches nationwide.

Mr. Arthur Murray, managing director of Carousel Colourhire, said that plans to extend the network were already well advanced. He said that rental charges would be, in some cases, lower than competing chains. A rental protection plan would cover payments for up to two years if the customer is unable to

meet them because of unforeseen sickness or unemployment. A recent report from stockbrokers Larrie, Millbank forecast that the television rental market was entering "a totally new era of growth" because of the range of TV-related products, like Prestel (the Post Office's information system) and videocassettes.

Airlines seek BA routes

BY MICHAEL DONNE, AEROSPACE CORRESPONDENT

FOUR UK independent airlines have asked the Civil Aviation Authority for permission to take over the 26 domestic air routes British Airways is giving up from March 31. The four airlines—Air Anghla, British Island Airways, British Midland Airways and Dan Air—are confident that they can turn British Airways' annual loss on the routes of £6.5m into profits. They are confident of profits because they will operate the routes with considerably fewer staff than British Airways. They say that many of the cities are already in their networks so that initially at least no additional staff would be needed. The four airlines aim to ensure a smooth transition by seeking rights to fly from April 1.

The Air Anghla/British Island group (part of the British and Commonwealth Shipping Group) are seeking the routes from Leeds/Bradford to Dublin, Belfast and Heathrow; Edinburgh to Belfast and Jersey; Guernsey to Manchester and Heathrow; Jersey to Southampton; and the Isle of Man to Manchester and Heathrow. British Midland Airways is seeking the routes from: Heath-

row to Birmingham, Leeds/Bradford, Guernsey and Isle of Man; Jersey and Guernsey to Birmingham; Manchester to the Isle of Man; and Jersey to Glasgow. Dan Air is seeking the routes from Newcastle to Belfast, Jersey and Dublin; Cardiff and Bristol to Guernsey, Jersey, Belfast and Dublin (and also to Paris); and Leeds/Bradford to Jersey. There are conflicting applications on only four routes—British Midland and the Air Anghla/British Island group are both asking for Heathrow to Leeds/Bradford, Guernsey and Isle of Man; and Manchester to the Isle of Man. The airlines hope that the CAA will settle the applications before Christmas, giving time in the New Year to complete arrangements for the takeover. At present, none of the airlines intends to buy new aircraft specifically to serve the routes. They believe they have adequate capacity to meet at least initial demand. All of them are already, or soon will be, studying fleet replacement plans, based on traffic growth throughout their networks including the additional routes.

Study oil spills' effect on sea, commission says

BY ELAINE WILLIAMS

THE COMMISSION on Energy and the Environment calls for research into the long-term effects of oil pollution on marine ecology in its first report published yesterday.

After a brief review of the UK research, wholly or partly government-funded, the commission concludes that more work is needed on the natural degradation of oil in the sea and on the new types of oil being shipped around UK coasts. The commission, set up in March 1978 by the Secretaries of State for the Environment, Energy, Scotland and Wales, recommends that the research should be carried out when the Royal Commission on Environ-

mental Pollution prepares its report on marine oil pollution. The commission sees its task as "providing an independent and considered contribution to Government thinking and to informed public debate about energy and the environment." It wants to ensure that the interaction between energy policy and the environment forms an integral part of the development of energy policy. It is gathering evidence from a large number of interested groups and individuals such as trade unions, electricity supply industry and other utilities in order to try and balance the need for adequate supplies of energy at reasonable costs against environmental protection.

NEWS ANALYSIS—MOTOR INSURANCE Premiums race inflation

BY ERIC SHORT

MOTOR INSURANCE premiums are climbing fast as insurance companies put up rates in response to a rising inflation rate. Premiums have risen by an average 16 per cent over the first nine months of this year, compared with 5.7 per cent over the whole of 1978, and 15 per cent for 1977. The average premium, based on the rates of the 10 major UK insurance companies for a mature driver of a 1,300 cc car, living in the Home Counties and with full no claims discount, was £40 at the beginning of 1977. By the beginning of 1978 it had risen to £50. On October 1, the average was £58.

later this year. It is unlikely that these companies can continue to go against the trend. Motor premium rates have had to be increased simply because the average cost of motor claims is rising much faster than was expected at the beginning of the year. The cost of claims reflects inflation in different ways. First, the cost of parts to repair a vehicle rises roughly in line with prices, although in recent years the rate has tended to exceed the rise in the Retail Price Index.

Conditions are once again, similar to those of 1973 and 1976, when motor premiums rose by an average 25 to 30 per cent. The other similarity with those years is that insurance companies are increasing rates more than once a year. This year has seen almost all the major motor insurance companies—General Accident, Eagle Star, Royal Insurance, Prudential, Sun Alliance—resort to six-monthly premium revisions. The second largest insurer, CRE, has found that it cannot hold its rates for 12 months, and is raising them on November 1, seven months after the previous increase. Of the major companies, only the Commercial Union and the Co-operative Insurance Society have managed to hold rates for 12 months, and the CU has warned of a possible increase

Winter Second, claims costs are affected by labour charges, which rise in line with earnings. Over the past 12 months, earnings have outstripped prices, and can be expected to do so over the next few months. Finally, claims costs are affected by the level of court awards for damages, which have been rising faster than prices or earnings. The motor accounts of UK insurance companies have already been hit by the severe winter weather early this year. Many motorists leave their cars at home if there is a short spell of bad weather. But this year the severe weather continued for several weeks, and insurance companies found the number of claims to be about a third above normal. The inflation rate is rising faster than expected. Insurance companies calculate pre-

mum rates to take account of inflation over the period during which they expect to hold the rates—say 12 months. In addition, the increase in Value Added Tax to 15 per cent added about 6½ per cent to the cost of claims, including those claims that had occurred before the increase, but which had not been dealt with. For the motorist, more frequent rate increases can reduce the anomalies arising from large premium charges. Insurance companies have been very uneasy that a motorist who renews his premium one day before a change of rate may pay 30 per cent less than one who renews one day after. It is therefore considered more equitable to have two 10 per cent increases at six-monthly intervals than to have a single annual increase of 20 per cent. Moreover, if rate increases are at random intervals, motorists have more difficulty in shopping around for the cheapest rate. When rates were increased at 12-monthly intervals, motorists were encouraged to shop around to find a company which had not recently put up its rates, and which might consequently be cheaper than its competitors for a while. Such shopping around inflates administration costs. The pattern may well have been set for six-monthly intervals between rate increases, even if inflation comes down next year. This year's round of rises is not expected to put motor accounts back into profit. It will contain the losses.

RAF Minister to visit U.S.

By Michael Donne, Aerospace Correspondent

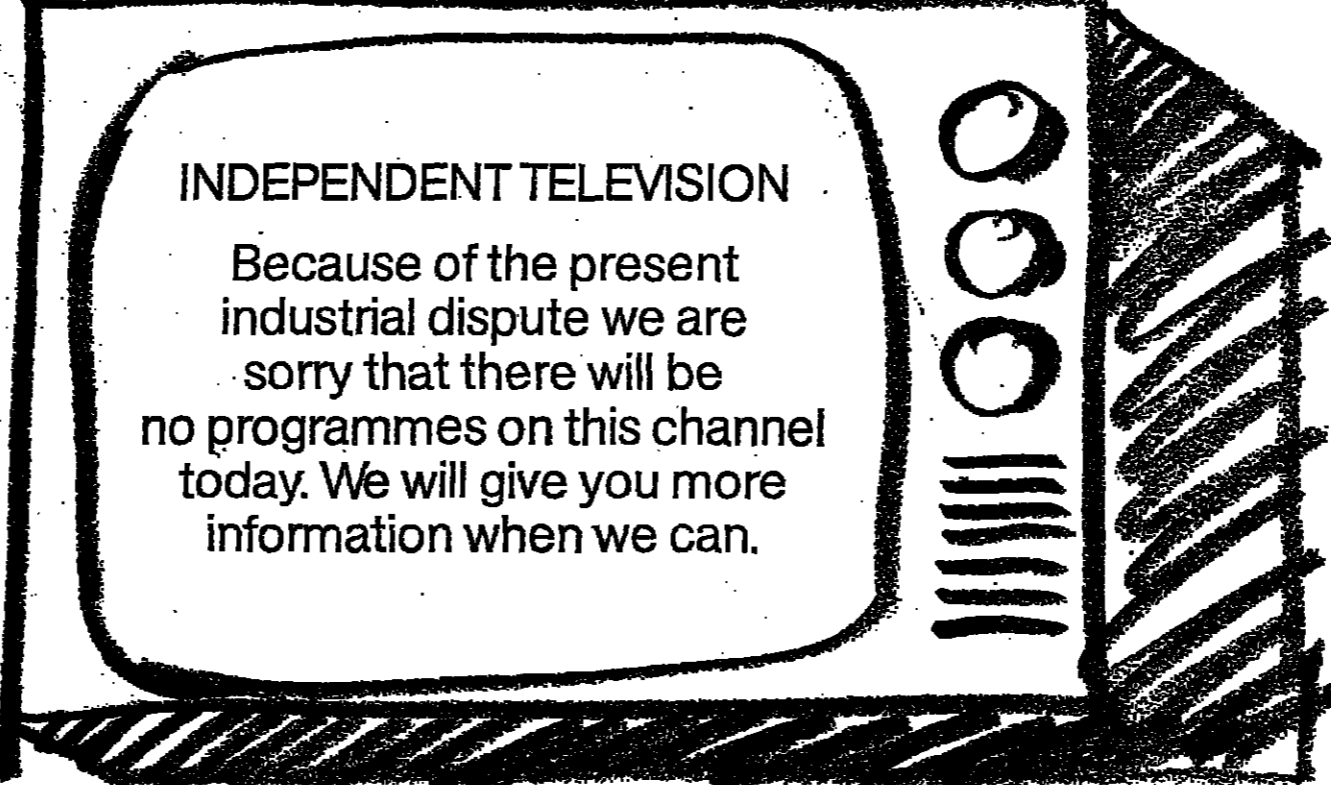
FACILITIES in Canada for low-flying training for the RAF, and an increase in purchases of UK defence equipment by the U.S., will be the main topics for discussion by Mr. Geoffrey Pattie, Minister for the RAF, during a visit to the U.S. and Canada from October 14 to 22. Starting in Ottawa, Mr. Pattie will discuss with the Canadian Government the provision of facilities, probably in Labrador, for low-flying training for RAF Tornado crews. During his visit to Washington, Mr. Pattie will widen his discussions to include the question of increased U.S. purchases of defence equipment.

Tory lawyers call for on-the-spot fines

BY JAMES McDONALD

ABOLITION of totting-up endorsements and the introduction of optional "on the spot" penalties for relatively minor motoring offences are proposed in "Motoring Justice," published yesterday by the Conservative Political Centre. The pamphlet written by Mr. Peter Temple-Morris, MP, arises out of a study group set up by the Society of Conservative Lawyers. The case against the totting-up procedure, is that "it is an arbitrary and often unfair system both in its application and enforcement. Offences are merely enforceable and in no way graded as to seriousness."

Instead of "waiting around in courts" the police should be provided with "an efficient and enforceable system of spot penalties." It is suggested that the French system of a "stamp penalty" would be appropriate instead of having money pass between the offending motorist and the apprehending officer. This would involve issuing a "ticket" on which the penalty inscribed would have to be paid to the Post Office for stamps which would be sent with the "ticket" to the relevant authority. Failure to comply would result in a court appearance and possibly a heavier fine.



INDEPENDENT TELEVISION
Because of the present industrial dispute we are sorry that there will be no programmes on this channel today. We will give you more information when we can.

Why not switch to Michelin? The performance goes on and on.

 SWITCH TO MICHELIN FOR LONGER LIFE.

BUSINESS AND INVESTMENT OPPORTUNITIES

READERS ARE RECOMMENDED TO TAKE APPROPRIATE PROFESSIONAL ADVICE BEFORE ENTERING INTO COMMITMENTS



GRESHAM TRUST LIMITED

Permanent and long term capital for the successful private company.

Also a wide range of banking services, including - Selective finance for property development Commercial and industrial loans Bill discounting Acceptance credits Leasing

For further information please telephone 01-606 6474 or write to Barrington House, Gresham Street, LONDON EC2V 7HE.

CONTAINER LEASING

Choularton's Tax Sheltered Investment Department undertakes the management of containers on behalf of private owners. As established Container Leasing Managers we can provide a professional service to individuals and companies who already operate in, or wish to enter, this area of international shipping.

For full details, please telephone or write to: J.C.D. Lowe Telephone: 061-928 9011



C.P. CHOULARTON SONS & PARTNERS LTD, Ashley House, 30 Ashley Road, Altrincham, Cheshire WA14 2DW

ATTENTION!

CORPORATE AND PERSONAL LESSORS Are you getting lower yields than you could enjoy? Are you paying your broker higher commission rates than we charge? Are you in any way dissatisfied with the service you get? SOLUTION: For full details of our competitive and efficient services just write your name on a letterhead and post to me TODAY

AC LEASING LTD LEASEBROKERS TO THE PROFESSIONS

FINANCE FOR THE GROWING COMPANY Obtain details of our Factoring and Invoice Discounting Services ARBUTHNOT FACTORS LTD, Breeds Place, Hastings TN34 3DG Contact: S. E. Finch Tel: 0424 430824

Democratic Republic of Afghanistan offers A Unique Opportunity for the Purchase of 50,865 kg of World Famous Afghan Lapis Lazuli (unsorted) BY AUCTION on 15th October, 1979, at Kabul For further details please contact or write to The President, Department of Mineral Exploitation Ministry of Mines and Industries Kabul, Afghanistan

INVESTMENT IN AUSTRALIAN PHARMACEUTICAL COMPANY Marketing-oriented Company, privately owned and currently selling and distributing own proprietary products through pharmacy in Australia seeks joint venture partner or company to provide additional production and investment capital to enable company to achieve further growth objectives. Last year turnover \$5.5 million and pre-tax profit \$5.0 million and currently showing 30% growth rate Reply in strict confidence to - Pharmaceutical Company c/o Anthony Murry & Co, Chartered Accountants, 70/71 New Bond Street, London, W1. Tel: 01-499 7912/3/4, Telex: 37944

ACQUISITIONS/U.S.A. If you would like to invest in or acquire small (turnover/sales of \$5-\$25 million per annum) companies in the U.S.A., perhaps we should exchange some information. Buyers vastly outnumber sellers, but Bartzex has proven expertise in identifying situations and negotiating and completing transactions. Write or telephone for more information: Bartzex, PO Box 1771, New York, NY 10017 Tel: (212) 888 1735

CASH FLOW ASSURED WITH H-H FACTORS LTD. Randolph House, 46-48 Wellesley Road, Croydon CR9 3PS, Surrey Contact - P. Cameron Tel. 01-681 2641

SELL YOUR COMPANY FOR CASH Substantial cash offers for companies engaged in property development or dealing or investment. Also for companies with large liquid resources. Serious replies only to: Box G.4342, Financial Times, 10 Cannon Street, EC4P 4BY.

A NEW WAY TO FIND MONEY FOR SOUND BUSINESS PROJECTS NEW VENTURE & PROPERTY-RELATED DEVELOPMENT FINANCIAL COUSINELLORS

PRECISION ENGINEERING AND Foundry Castings and Machine Tools, Lester on Union 05821 2816.

Take a close look at Fine Stamps

Falkland Islands 1933 Centenary Issue. A series of twelve stamps issued in January, 1973 to commemorate the 100th anniversary of the Falkland Islands. A series of these stamps were purchased in March 1975 for £20. Today's current market value is £1,000. For further information on this most lucrative of non-traditional investments, contact the address below.

Fine Stamp Investment Service Urch Holdings Limited, 14 Christmas Steps, Bristol BS1 5BS, England Telephone: (0272) 20442.

Your AUSTRALIAN Office The International Executive Centre at 626 Bourke Street, Melbourne, Australia, provides overseas Companies with all the facilities and services of your own branch office. It does so for an all embracing annual subscription of only \$A1,500. For details write to the Executive Director at the above address or telez your Company name and address to AA 36739.

GET TODAY'S FACTS ON LEASING. K. Copley, Westcliff-on-Sea 0702 78615 W. K. Hargreaves, Bournemouth 0202 766031 R. Arthur, Berkeley Square, London 01-629 8818

HENLYS LEASE FROM A MINI TO A ROLLS ROYCE

MONORAIL A rare opportunity to install and operate a passenger carrying monorail on a busy holiday resort promenade. Annual 1,250,000 visitors. 20-year lease with the council agreed at very reasonable rates. Building permits obtained and design calculations accepted. 4-40 passenger trains already operating Easter 1980. 200,000 shipped to this country. Can be loan for interest and equity position. METRIM LTD Tel. 0602 223278.

REINFORCED PLASTICS/GRP Established GRP moulding company having expanded capacity, seeks further production load, sub-contract or product/project. Hand spray, resin cast, vacuum impregnation and cold pressing facilities. 1,100 sq ft design and metal fabrication capacity. If interested please write or phone Managing Director or Sales Manager, Polystructures Ltd, Botley Road, North Baddesley, Southampton SO6 9DD Tel. Rowlands (0703) 73392 5.

OFFICE FURNITURE Desk 6' 6" shared top in Total 2225 Desk 6' 3" in Total 2175 Mahogany Reception Desk, hide top 9 drawers 1275, Desk 5' (shared) 1565. 655 Pine Chests 16 Drawer Units, cost new £700 offers 400. 1000 Vertical Plans Chests a size £225. Adler Electric Typewriter £200. Olympia Electric Typewriter £250. Many other bargains call Mr Clark. COMMERCIAL - 01-377 9665

ESPECIALLY FOR SMALL MANUFACTURERS If you want to expand, find new markets, then you must be thinking of exports. We have the export marketing facilities, you can assist with in all possible aspects. Please write Box G.4658, Financial Times, 10, Cannon Street, EC4P 4BY.

£10,000 £10,000 Risk Capital available to invest in Profit Making Product or Idea. Tel: Weybridge 47341.

GOLD SOVEREIGNS AND KRUGERANDS Bought and sold in strictest confidence. Also Held on Full Sovereigns (gold) wanted minimum £50,000. £65 paid. SHAW CAVENTISH & CO. (Building Dealers), Cavendish House, Chester, CH1 1YF.

IMPORTERS EXPORTERS Fine new business ideas in Import Export Opportunities Offered, the new monthly listing of import companies who are currently and actively seeking contacts with their British counterparts. For details write to Import Export Opportunities, Dept. ET, 15, Selwaie Lane, London NW7 3SE.

STUNTED GROWTH? If interest rates and cash flow problems are holding back your company's development you may not get in touch with us. Principals only should contact in confidence. The Managing Director SHENLEY INTERNATIONAL FINANCE LIMITED, Imperial House, 15-19 Kingsway, London WC2B 6UN. Tel: 01-835 6921 9

WELL-CONNECTED Distributor/Agent required for new super quality competitively priced Synthetic Chamis Leathers. Table place mats and novel printed Book Car mat also available. Contact W Sparks, Chairman, C.M.I. LTD, Wood Street Works, Burnley, Lancs. Tel: 20621.

CIGARETTES WANTED ex bond, FOB or CIF, for export to Middle East by company well established in parallel market. Full of part containers, single or mixed brands, with and without Arabic health warning. Contact Robert Eaton Tel: TW6227-112. Tel: Overseas (026 378) 310 or Telex: 975302 Twved G.

IBM ELECTRIC TYPEWRITERS Factory reconditioned and guaranteed by IBM. Buy save up to 30%. Lease 3 years from under £3 weekly. Rent from £26 per month. Tel: 01-441 2365

PROGRESSIVE COMPANY WELL-ESTABLISHED in expanding section of Computerized Office Systems. Market wishes to attract finance in exchange for 100% share. Financial Times 10, Cannon Street, EC4P 4BY

S.123 BANK REQUIRED A well established UK Merchant Bank with substantial funds available is interested in acquiring the business of an S.123 bank with a well-balanced loan portfolio. Write Box G.4659, Financial Times, 10, Cannon Street, EC4P 4BY.

PLASTIC MOULDING MACHINERY A well established Manufacturing Company seeks an association with a national or international company to extend the market penetration for its comprehensive range of proven plastic moulding machines. Please send brief details to: Box G.4661, Financial Times, 10, Cannon Street, London EC4P 4BY.

TELEX TYPING IN SW1 Full Secretarial Service conveniently situated in Victoria TELEX - TYPING - PHOTOCOPIING, ETC. Please ring 222 1181 for details.

CAR AND TRUCK HIRE COMPANY with net assets in April 1979 of £219,700, profit before tax £80,000, projected net assets to April 20, 1980, £310,000, profit before tax £100,000. Directors wish to dispose of majority interests but remain in major shareholding. Principals only please reply to: Box G.4670, Financial Times, 10, Cannon Street, EC4P 4BY.

MIDDLE EAST AIR FREIGHT for low rates to Kuwait, Abu Dhabi and most Gulf destinations telephone Gulf Services Hatfield 66856. Telex 25102 GULFSERVE.

LEISURE/TOURISM If you are considering an investment in the leisure/tourism industry you may save time and money by contacting us first. We specialise in feasibility reports, linking finance to projects, and cover all the many varied aspects of this growth field. ADVENTURELAND LIMITED, 15-19, New Bond Street, London W1P 8PF, Tel: 01-499 8567/7

A LEADING COMPANY in the LEISURE MARINE INDUSTRY is seeking to expand within the industry and allied fields. Company wishes to purchase suitable purchase should write giving details of facilities and products. Box G.4668, Financial Times, 10, Cannon Street, EC4P 4BY.

INTERNATIONAL BUSINESS CONTACTS and knowledge from U.S.A., Europe and U.K. provided at international market-week. For details write to: MBE (162) 9 Westminster Palace Gardens, 17 Arundel Row, London SW1. (01-222 4667)

UP TO £1m. AVAILABLE BUSINESSMAN offers investment and consultancy, management assistance, particularly in sales and marketing, to suitable incoming company. Write Box G.4669, Financial Times, 10, Cannon Street, EC4P 4BY.

INDEPENDENT BUSINESSMAN travelling regularly West Africa seeks to represent companies selling industrial and construction plant and equipment. Continuous association envisaged either on retained basis or commission only. Please write to Philip Williamson, Box G.4669, Financial Times, 10, Cannon Street, EC4P 4BY.

TOP BUSINESS EXPERIENCE MD of successful major company is now developing own interests - new business creation, financial planning, international markets. Can offer harassed MDs valuable support and wide-ranging background as a part-time director. Telephone 042-879 4626

VENTURE CAPITAL REPORT, 2 The Mall, London SW1Y 6LR. This report contains capital to small business investors. Entrepreneurs ring 0772 37223. SUCCESSFUL and well-capitalized accounts require mortgage of £25,000 to £50,000. We offer 12% p.a. or may be able by way of consultation. Top of £2125 per month. Telephone 0772 37223.

PACKAGING London-based private company in the packaging industry is seeking to expand its interests in export packaging, packaging materials and container manufacturing. We would be interested to hear from companies or individuals wishing to dispose of all or part of their businesses. Principals only write Box G.4656, Financial Times, 10, Cannon Street, EC4P 4BY.

Thoughts for Increased Personal Power Order your copy today - it's FREE! Success Motivation International is a multi-million dollar publicly held corporation in Waco, Texas, dedicated to motivating people to their full potential. Our success motivation and goal setting programmes and tapes are sold in 52 countries. Write to us TODAY and we will send you information describing an exciting business opportunity. Achieve SUCCESS by selling - SUCCESS. Write: LEADERSHIP DYNAMICS LTD, P.O. Box 53, Edgware, Middlesex.

CAPITAL AVAILABLE FOR BUSINESS ENTERPRISE RETAIL PREFERRED PRINCIPALS ONLY Write Box G.4662, Financial Times, 10 Cannon Street, EC4P 4BY

LESSOR WANTED for quoted company new plant and equipment. For details write Box G.4664, Financial Times, 10, Cannon Street, EC4P 4BY.

TOY/HOBBY MARKET Developer of new, low money needed product with large worldwide sales potential, seeks to negotiate a marketing (and possibly also manufacturing) agreement with substantial company interested principals please contact W. G. DOWNEY, WILSON, GUNN & ELLIS, Chartered Patent Agents, 21 Royal Exchange, Manchester M2 7DB

ENGINEERING BUSINESS FOR SALE Turnover approx £3.5 million per annum The business manufactures pressure and other types of vessels for the process and chemical industries as well as steel fabrication work for mining equipment, heat exchangers, etc. There are modern electronic testing facilities available, enabling production to the A.S.M.E. Specification. Situated close to the Lancashire motorway system, the well-equipped freehold engineering premises comprise some 95,000 sq ft. The workforce numbers circa 350 employees. Principals only Write Box 15013 Reynolds, Eldon Chambers, 30/32, Fleet Street, London EC4Y 1AA

FOR SALE SHEET METAL ENGINEERING COMPANY PRIME SITE SOUTH HAMPSHIRE Turnover in excess of £1 million Substantial assets including 30,000 sq ft Freehold Factory and 15,000 sq ft Leasehold Factory. Write Box G.4663, Financial Times, 10 Cannon Street, EC4P 4BY.

PROFIT MULTIPLIED TWENTY-FIVE TIMES This is my record as Chairman-Managing Director of a holding company and as a director of a subsidiary company in smaller companies as well as in a public company. I am also a director of a subsidiary company in the same industry. I am also a director of a subsidiary company in the same industry. I am also a director of a subsidiary company in the same industry. I am also a director of a subsidiary company in the same industry.

IF YOU OWN OR ARE PURCHASING ANY TYPE OF MODERN OCEAN-GOING VESSEL then ship management subsidiary of currently Britain's most successful shipping group will manage your vessel with the same care and consideration as their own under either British or foreign flag. Write Box G.3050, Financial Times, 10, Cannon Street, EC4P 4BY.

LIMITED COMPANIES FORMED BY EXPERTS FOR £80 INCLUSIVE READY MADE 689 COMPANY SEARCHES EXPRESS CO. REGISTRATIONS LTD 30 City Road EC1 01-628 5434/5, 7361, 9936.

BATTLING BOARDROOMS If your Board Meetings are marred by policy disagreements or personality clashes, an experienced, semi-retired, independent Chairman can help reduce the temperature. Fully backed by outside advice whenever I can assist two more seats, but other colleagues are also available for medium-size businesses preferred. Write Box G.4672, Financial Times, 10, Cannon Street, EC4P 4BY.

SMALL BUT ENERGETIC GROUP OF COMPANIES requires Finance for Expansion and Managing Director willing to exchange Equity in return for Capital Injection. Enquiries in writing please to: GARFIELD ORGANISATION, 14, Market Place, Whitlsey, Peterborough.

★ A WEEK FOR £23 address or phone message. Combined rates plus telez under £3 a week. Prestige offices near Stock Exchange. Message Miners International. Tel: 01-628 0958. Telex 8011725.

PHONE MATE America's best selling telephone answerers for worldwide use. Models from £145-£450. European Sales and Service Centre, 281A, Finchley Road, N.W.2. Tel: 01-437 9266.

BUSINESS START-Young man City experience, some capital, wishes to join others to build a business. Write Box G.4655, Financial Times, 10, Cannon Street, EC4P 4BY.

DRY CLEANING AND RETAIL WOOL SHOPS an unusual opportunity to acquire a well established and profitable business on the Surrey/Hampshire borders. 4 leasehold shop premises, 2 with separate living accommodation over, and all situated in prime trading positions. Substantial yet realistic price required, the whole including plant, vans, goodwill, etc. Audited accounts available. Full details apply the Agents: Watson Bull & Porter, 9 Church Street, Ventnor, Isle of Wight (Tel. 852021) STD code 0983

PROFITABLE CONTRACT LABOUR COMPANY FOR SALE Working for government departments, removal industry, etc. Turnover £170,000 year to June, 1979. Good contacts and staff of 24 operating from London W1 premises. Principals only reply to Box G.4657, Financial Times, 10, Cannon Street, EC4P 4BY.

GARSTANG, NEAR PRESTON Caravan Park Permission for 162 residential and 42 holiday units Sales Area adjacent to Main Road Shops, Workshop, etc. 4-bedroom House Apply: BODY SON & FLEURY 57 Tufton Street, London SW1P 3QR 01-222 5786

PRECISION ENGINEERING FABRICATION AND ASSEMBLY COMPANY FOR SALE South Dorset Industrial Estate Modern freehold factory 14,000 sq ft fully equipped with skilled loyal staff of 30. Balance Standard £5.24 Reason for selling major shareholder wishes to retire but present Managing Director would remain if needed. Replies to Rothman Pansil & Co., 18, South Street, Haverly, Hants.

ART GALLERY in best part of West End of London for sale. Owner retiree. Enquiries, Box G 4638, Financial Times, 10, Cannon Street, EC4P 4BY

BUSINESSES WANTED WANTED TRAVEL AGENCY CENTRAL LIVERPOOL AREA ACQUISITION SOUGHT OF ESTABLISHED BUSINESS WITH SUCCESSFUL TRACK RECORD MUST BE MEMBERS OF IATA AND ABTA Please reply to: Box G.4658, Financial Times, 10, Cannon Street, EC4P 4BY.

WANTED HOME COUNTIES Small-medium size Builders' Merchant, capable of expansion. All replies acknowledged. Reply to: Mapping Director, Box G.4660, Financial Times, 10, Cannon Street, EC4P 4BY.

PRINTER IN WEST LONDON with a surplus capacity of up to 100,000 seeks to purchase good will of similar business in NW, W or SW London. Write Box G.4668, Financial Times, 10, Cannon Street, EC4P 4BY.

مكتباتنا الجديدة

UK NEWS—LABOUR

Civil Service unions aim to change policy body

By PHILIP BASSETT, LABOUR STAFF

BRITAIN'S largest and most militant Civil Service unions, whose strikes over pay this year have disrupted Government, business and Post Office work, could take over effective control of policy-making for all the unions if proposals being studied by union leaders are accepted.

The proposals for changes in joint bargaining and representation procedures reflect the increasing militancy and deep splits among the unions which have developed this year, and could lead to major alterations in the Civil Service's 60-year-old negotiating system.

The unions' examination of the joint machinery follows the divisions which developed between the unions on the staff side of the Civil Service National Whitley Council during the strikes by the Civil and Public Services Association and the Society of Civil and Public Servants.

Both unions withdrew from the central policy-making body of the staff side—Committee A—and said they would dismantle the whole Whitley system of representation after accusing other unions of "secret" deal with Labour Ministers.

Though a paper from the SCPS now being discussed by union leaders does not go that far, it reflects SCPS and CPSSA members' calls for greater involvement by ordinary members and is considerably more radical than a paper circulated by Mr. Bill Kendall, staff side secretary-general.

lieves would prevent the Confederation taking a decision in direct conflict with the policy of an individual union.

The document admits that this could lead to individual unions splitting national negotiations and concluding their own settlements.

The union advocates setting up a permanent negotiating team of officials from the SCPS, the CPSSA and the other large union, the Institution of Professional Civil Servants, which has also taken disruptive industrial action this year, and a Confederation official, to handle day-to-day matters with Ministers.

Further indications of the union's determination that power should directly reflect membership size lie in its downgrading of the present Committee A system, where union general secretaries shape policy before it is presented to the full staff side, into a sub-committee merely reporting to the full Confederation.

The document also suggests increasing the power of individual union officials at the expense of the power presently enjoyed by staff side officers, but to avoid embarrassment suggests a full view of this when Mr. Kendall retires.

Further indications of the union's determination that power should directly reflect membership size lie in its downgrading of the present Committee A system, where union general secretaries shape policy before it is presented to the full staff side, into a sub-committee merely reporting to the full Confederation.

Permanent team

Seats on the Confederation would reflect the respective sizes of the individual unions, based on the policy of one seat per 10,000 members. This would give the SCPS and the CPSSA more than half of a new total of about 80 seats, instead of the present arrangement where they can be outvoted by the other less-militant unions.

Some BOC men reject 11.5%

By Nick Garnett, Labour Staff

WORKERS at BOC Gases Division's biggest depot at Wembley have overwhelmingly rejected the company's "final" offer which union negotiators estimate at 11.5 per cent.

The offer is to cover a period of seven months, after which any deal this year will be renegotiated. Union officials expect voting results from most of the division's 40-odd depots by the end of the week.

Apart from Wembley, drivers and gas cylinder-handlers at Bristol have rejected the offer, but the workers at the small Ipswich and Letchworth depots have accepted.

The offer to the division's 3,000 manual workers, involves a flat rate increase of 27 on existing basic rates of £74 to £78 and consolidation of a 26 bonus, leaving £6.56 still unconsolidated, and significant improvements in shift pay.

The shift pay improvements are likely to be acceptable to the workforce, but the offer on basic rates was expected to cause difficulties.

The settlement date for the group is this month. In the last negotiations management committed itself to restoring the more traditional settlement date, May.

Vauxhall workers to continue strike

By PHILIP BASSETT

PRODUCTION WORKERS at Vauxhall Motor's Ellesmere Port factory on Merseyside voted yesterday to continue their five-week-old strike, in spite of a warning from the company that it was jeopardising the future of the plant.

Members of the Transport and General Workers' Union at the plant were recommended to "continue to fight" at a mass meeting attended by nearly all the plant's 3,000 TGWU members. Half a dozen speakers called for a return to work, but the vote was decisive. Officials claimed it was 2-1 against a return.

A vote to return would not have started production again, since the 5,000 members of the Amalgamated Union of Engineering Workers at the plant have yet to have a mass meeting on the company's 17 per cent pay offer.

All production at the plant has been halted during the strike. Although the Cavalier and Carlton are still being produced at the company's two southern plants, up to 6,000 workers have been laid off there, and the van line at Luton and the truck line at Dunstable have been shut down.

Most of the unions at Luton and Dunstable have accepted the offer, leaving the more traditionally militant Ellesmere Port isolated. But AUEW shop

stewards at Dunstable have voted 53-1 against calling a mass meeting of their membership to put the offer to them.

Leaflets will be distributed among the AUEW members at Dunstable on Thursday, but it is clear that the stewards will not call a mass meeting if the company rejects it.

All Ellesmere Port has paid workers yesterday a "day" of leave from Mr. David Young, the company's personnel director and leading negotiator, setting out the company's doubts about the future of its operations.

Explaining that the plant's future was in the hands of its workforce, Mr. Young said: "I urge you to think how serious things are. There is no Britonless port of gold. The Ellesmere Port plant must earn its own future and that is what I am urging you to do."

Workers at Rover, Solihull, voted yesterday to end their five-week strike over proposed manning levels.

The company has cut the labour force by more than 1,000, but intends to build as many cars on two assembly lines as were formerly manufactured on three.

Talks will continue with the trade unions on the details of the production proposals.

Important Auction Sales

October 25th - November 10th, 1979



IMPORTANT PAINTINGS, WATERCOLORS, GRAPHIC WORKS and SCULPTURES of the 18th and 19th centuries: Bonnard, Boudin, Braque, Chagall, Corbié, Corot, van Dongen, Erté, Ernst, Kokoschka, Le Corbusier, Léger, Magritte, Marc-Katz, Marquet, Matisse, Miró, Monet, Moore, Orlán, Picasso, Portinari, Picasso, Renoir, Rouault, Utrillo, Vlaminck.

PAINTINGS of the 17th century: Baden, Elliger, Gyselaer, Heerstrams, Horemans, Kerckx, Knaes, Momper, Sorgh, Stock, van de Velde, Wouwerman.

BARE FRENCH FURNITURE of the 17th, 18th and 19th centuries, many pieces stamped.

A large collection of RUGS and CARPETS, TAPESTRIES, Rare CLOCKS, BRACKET CLOCKS, SCULPTURE and BRONZES.

IMPORTANT JEWELS COLLECTION OF 120 COFFEE MILLS EUROPEAN PORCELAIN and FAIENCE.

SILVER collection of MINIATURES, SNUFF-BOXES, ICONS. A large COLLECTION of GLASS and ART NOUVEAU objects.

Highly important collection of ORIENTAL ART: SCULPTURE, IVORY, LACQUERWARE, JADE, SNUFFBOTTLES, TSUBAS, PAINTINGS, FAR EASTERN CERAMICS.

PREVIEW October 11th through October 22nd 1979, daily from 10 a.m. to 10 p.m. On Sundays from 10.30 a.m. to 10 p.m. On Tuesday, October 23rd, last day of exhibition, from 10 a.m. to 6 p.m. After October 23rd and until the day of the sale appointments may be made for private viewing.

Galerie Koller Zürich

Rämistrasse 8, 8001 Zurich, Tel. (01) 47 50 40 Telex 58500

Two snags threaten bank union talks

By Nick Garnett, Labour Staff

STAFF BODIES involved in negotiations on the formation of a new union for the banking industry have agreed areas for further detailed working party discussions.

Two major difficulties threatening the negotiations, however, emerged at the last meeting between the clearing bank staff associations and the Banking Insurance and Finance Union.

The banking union has told the staff associations that it is not prepared to re-enter the old system of joint negotiating machinery while merger discussions continue. The issue will be put before an executive meeting of the union next month.

It also told the staff associations and Dr. Tom Johnston, chairman of the Scottish Manpower Services Committee, which is holding the inquiry into staff representation, that certain issues should be clarified "outside the working parties."

It has informed the staff bodies, for example that although the second report of Dr. Johnston has come down against geographical structure, the banking union would need to keep some of its present geo-

graphically-based organisations. Re-entry into national negotiating machinery as "an act of faith" is included in both Johnston reports and has been accepted by the staff associations.

Mr. Lelf Mills, the banking union's general secretary said yesterday that the reason the staff associations, particularly that at National Westminster, wanted BIFU to agree to this was that the staff associations did not want the Johnston talks to succeed. A decision by BIFU to re-enter machinery would allow the staff associations to sit back and delay further talks on Johnston, said Mr. Mills. If BIFU did not re-enter the machinery—and Mr. Mills said it would not—then it would be blamed by the associations for breaking up the merger talks.

"I deplore the attitude of the staff associations. It is disingenuous and unhelpful. I think it is time the banks put the screws on the staff associations." This was hotly denied by the staff associations yesterday who accused the banking union of attempting to re-negotiate the second Johnston report.

Officials deny strike extortion charges

A UNION official accused of extorting money from a haulage operator during this year's lorry drivers' strike, sold another official the firm involved had been "causing the union a lot of trouble," a court was told yesterday.

Two officials of the Transport and General Workers' Union, Mr. William McCaig and Mr. James McCreadie, have pleaded not guilty at Kilmarnock Strathclyde Sheriff Court to demanding money from the transport manager of an Arran haulage firm to allow journeys to be made to carry essential food and medical supplies to the island.

The charge alleges that they told Mr. Robert Millar, transport manager of Arran Transport, and Mr. Robert Haddow, a director, that if they did not pay money equivalent to hourly wages for drivers, and accompanying pickets to the union, journeys would be prevented.

It is alleged that Mr. Millar and Mr. Haddow were "in such a state of apprehension" that they paid £130.

Mr. McCaig, union district secretary in Saltcoats, Ayrshire, and McCreadie, Saltcoats district officer, also denied another charge of attempting to extort money from a haulier in Irvine, Ayrshire, when money was not handed over and they were said to have prevented the collection and delivery of milk by tankers.

Mr. Raymond McDonald, union regional secretary in Scotland at the time of the strike in January, said that after he was shown two £26 cheques, payable to the union by Arran Transport, during a BBC programme, he asked McCaig about them the next day.

"He said he wasn't sure about the cheques but he would look into it. I told him if there was any doubt the money should be returned," said Mr. McDonald.

"Mr. McCaig did say that Arran Transport were causing them a lot of trouble. He said pickets were not satisfied with what the company were doing regarding claiming that supplies were emergency supplies."

The hearing continues today.

Study on rights of employees

THE RIGHTS of employees in companies with financial difficulties should be the first consideration of newly-appointed receivers or liquidators, says a study published yesterday.

The study—Employees' Rights in Receiverships and Liquidations, by Guy Parsons and William Ratford—says that workers should be informed of the financial state of their company, to prevent unnecessary rumours.

THE FINANCIAL TIMES CHRISTMAS GIFT GUIDES

Please ring CHRIS MANSON of the Financial Times on 01-248 8000 Ext 595 for further advertising details

Crédit Industriel et Commercial LONDON 74 London Wall EC2M 5NE Telegraphic address: Canonics Ldn EC2 Phone 638 57 00 (20 lines) Telex 886 725 Canonics Ldn Foreign exchange telex 888 959 Canonex Ldn



There's no business like somebody else's business.

At The Observer we believe business is about people. People who make the decisions; people who make the products; people who make the purchases.

And good business journalism is, above all, about listening to people.

That's why, in every facet of the paper—from government, union and City coverage, to the Careers, Family Finance and Innovations sections—you'll find the accent is on the faces behind the figures.

"How can Bob Price of General Motors convince international companies to contribute more to the community?"

"What did Walter Goldsmith say to Arthur Scargill over the port?"

"Why has the City overlooked Terry Maher for so long?"

We even have a Company Reports Service so you can find out how your competitors are doing.

And a Top Jobs Register so you can find out how much they're earning.

If you'd like to know what we've been hearing about your rivals or colleagues; bosses or workers, read the Business Observer.

And mind somebody else's business for a change.

THE OBSERVER

Advertisement for BOYDS BANK featuring a man in a suit reading a newspaper. The text 'BOYDS BANK' is visible on the newspaper page. The man is looking at the newspaper with a serious expression.

THE JOBS COLUMN

Keen eyes for small-firm export prospects

BY MICHAEL DIXON

"WHAT about mad-eyed inventors?" I asked. Christopher von Luttitz contemplated his Wiener Schnitzel philosophically. "That all depends on what you mean by mad-eyed inventors," he replied.

After merchant banking his wild oats in New York and London, Mr. von Luttitz was approached some three years ago by certain private moneybags in West Germany and Switzerland who wished to spread investment by backing small companies in various countries.

Seeing this wish as an opportunity, the now managing director of Capital Partners International decided that the most fertile ground for such investment would be small companies with products and services worthy of export, but which were not yet attacking overseas markets.

"That's the way with exporting," he said. "The smaller your company, the bigger your problem."

Today, with three full-time executives, three support staff, and a bevy of advisers on call, he is spreading the aforesaid financial seed among a growing number of concerns, particularly those with potential to use well the worldwide marketing contacts available to his company.

The ground rules for assessing prospects are threefold. Does

the small company have a product or service which can be patented or otherwise protected? Is the product or service amenable to promotion in markets abroad?

The third rule is that the investment needed through CPI should not exceed £300,000 or the equivalent although, where an especially promising venture requires more, Mr. von Luttitz can arrange to invest in partnership with other financial sources.

The return CPI requires for its help generally depends on its view of the risk. Equity stakes taken so far range, 1 garter, from 60 to about 20 per cent.

This implies another, overriding yardstick. It is that the product or service offers the prospect of building a substantial business around it (although not necessarily based in the country where the development originated). Accordingly, it seems, the schemes taken up by CPI tend to be passed on to it after preliminary sifting by such as management consultants or even accountants who, as any engineer or salesman will tell you, are rarely acclaimed for their vision.

Hence my question about mad-eyed inventors.

I have this idea for a multi-link holographic telephone, you see. It will enable people such

as business men to project three-dimensional, listening and speaking images of themselves simultaneously into each others' offices. At the touch of a button, they will be able to hold meetings with contacts all over the world if need be, just as if they were all really there in each place—except that they wouldn't be able to thump one another, which would be an advantage.

True: this, surely, relatively simple piece of technology might cause a bit of a problem for companies making aeroplanes, cars, and otherwise purveying physical travel. But progress is progress, after all, and...

Perhaps fortunately, however, I had no time even to mention this brainchild before Christoph von Luttitz made the previously quoted reply, and went on to give his definition of the mad-eyed variety of inventors.

The definition included people who can envision grand schemes but cannot fold a deck chair (which happens to be uncomfortable close to home for me). He also included those who, having devised an apparently saleable product, are convinced that they can necessarily develop it into a profitable business single-handed and so, while willing to accept financial backing, will not take managerial or financial advice.

Such people are fairly prominent among the 350 or so inquiries CPI now receives annually, of which about 60 gain further attention as serious prospects.

But Mr. von Luttitz is keen to increase both the inflow of inquiries and the proportion of the serious "starters." So he has some "the Jobs Column" hoping that interested and well informed businessmen and managers, particularly those in retirement or close to it, might be willing to work part-time as talent scouts for Capital Partners International.

Besides a developed sense of what constitutes a sound basis for international trading, candidates need consummate understanding of what is going on in a particular industry, or in the commercial life of a region. Given such awareness and the curiosity to find out more, the talent scouts could operate from virtually anywhere in the world.

"It doesn't matter whether they want to work two days a month or a lot more—although it will affect the terms we make with them, of course. But they will have to take the initiative of looking for prospects. Small companies rarely find themselves with an urgent need for development capital, so they don't get much practice at spot-

ting the need and finding the money. So finding the opportunities is the responsibility for the financing professionals like us," the CPI managing director added.

He is offering to meet the talent scouts' necessary expenses, and to pay a commission. This will vary, particularly with whether the scout wishes only to put prospects in touch with the company, or to take part in formulating the deal. Beyond this, a scout might wish to continue to work part-time in advising on or managing the new business development which resulted from the deal.

Mr. von Luttitz would prefer inquiries to be written to him at Westland House, 17e Curzon Street, London W1T 7EJ—telex 885 3882 Copyr G. But justifiably impatient readers could telephone him at 01-491 4279.

City batch

NOW to a batch of jobs from head-hunter Norman Philpot. The first is with a major European bank which he may not name, but he guarantees to abide by any applicant's request not to be initiated by the employer until permission has been given.

The bank wants a demonstrably capable person to take control of its business-develop-

ment activities in the United Kingdom, which are particularly concerned with the "top" 300 companies. The salary indicator is £17,000 and the perks will include a car. The age preferred is mid-30s.

Several recruits are needed for the second offer, being made on behalf of Sarabex, a newly established company of money brokers in London. It is in the market for an unspecified number of experienced spot foreign exchange brokers. No certain figure has been set on basic salaries, but I gather that these will be towards the £15,000 mark.

In the final instance, Mr. Philpot is hunting a head on his own behalf. Specialising in City-type appointments, he wants somebody who will largely generate his or her own work, and I'm sure that good contacts in banking would be a great advantage. So, of course, would be experience in recruiting people for senior posts. Arrangement for salary, bonus, perks and so on are apparently so flexible as to be beyond any meaningful indicator.

Inquiries to the said head-hunter at NPA Recruitment Services, 80, Cheapside, London, EC2R, and they should be made in writing because Norman P. is gallivanting around the Middle and Far East and won't be back until Trafalgar Day.

SENIOR ACCOUNTANT SOUTH-EAST ASIA

Immediate Vacancy

Salary (including allowances) to U.S.\$40,000 p.a.

Qualifications: Formal qualifications in accountancy preferably including Cost Accounting. Minimum 15 years' experience since qualifying. Age 40-55 years.

Experience: Comprehensive accounting experience, including experience as a Cost Accountant, preferably with some in the developing countries. Experience on the cost control of construction and maintenance equipment. Knowledge of computerised operations of accounting an advantage. Experience with P.W.D. of a developing country would be ideal.

Duties: As a member of a consulting team providing Advisory Services to a Highways Department, responsible for implementing accounting procedures for the control of expenditure on highway maintenance, in particular the operation, maintenance and repair of road maintenance equipment.

Location: The project office is located in a capital city, where good standard housing and school facilities are available.

Leave at rate of five weeks for each year of service, home leave with fares provided at mid-term. A car is provided.

The position is available for the appointee to take up his duties immediately.

Applications in strictest confidence to:

Valentine Laurie & Davies
Consulting Engineers
Clifton House
83-89 Uxbridge Road
London W5 5TS

VLD

CJA

RECRUITMENT CONSULTANTS

35 New Broad Street, London EC2M 1NH
Tel: 01-588 3588 or 01-588 3576
Telex No. 887374

A challenging appointment offering considerable scope for further advancement



COMPUTER AUDIT MANAGER - BANKING

£13,000-£16,000 + BONUS

MAJOR INTERNATIONAL BANK—ASSETS IN EXCESS OF U.S.\$30 BILLION

Applications are invited from Chartered Accountants aged 30-40, who have acquired a minimum of four years' computer-based systems design and implementation experience at project leader level, gained preferably in banking or another financial environment. The successful candidate will be responsible for computer auditing standards and development in the bank's London branch, which includes long-range systems planning, quality reviews of all systems design and applications, and training and career development for a team of five. A strong commercial awareness, a firm and positive approach and the ability to communicate effectively with senior management are essential qualities. The bank attaches great importance to this appointment and an attractive salary will be paid, together with a wide range of fringe benefits, including a low-interest mortgage facility and non-contributory pension, life and medical insurance plans. Applications in strict confidence under reference CAM8942/FT, to the Managing Director:

CAMPBELL-JOHNSTON ASSOCIATES (MANAGEMENT RECRUITMENT CONSULTANTS) LIMITED,
35, NEW BROAD STREET, LONDON EC2M 1NH. TELEPHONE 01-588 3588 or 01-588 3576, TELEX 887374.

Banking Appointments
FLUENT SPANISH SPEAKING
CREDIT ANALYST
LOANS ADMINISTRATOR

required by leading international bank, aged 24/30 Salary c. £6,500/£8,000 plus excellent benefits. To join team for market staff. Work will involve preparation of credit committee presentations/client liaison/reading annual reports/analysing proposals.

Ring for appointment
V.P.N. EMPLOYMENT
01-623 2372 or 283 6023

JUNIOR POSITION

A small, but expanding firm of Financial Advisors require a numerical school leaver educated to 'A' level standard. This is a very good start for a young person wishing to enter the world of finance, and for the right candidate the opportunities within the company are excellent. Modern attractive offices near Trafalgar Square. Salary: £2,500 p.a. To arrange an interview please phone

Caroline Jakeman
930 0855

P.D. Recruitment Consultants

MALAWI—

THE WARM HEART OF AFRICA

Capital City Development Corporation which is responsible for the development of the new and beautiful capital city of Lilongwe wishes to fill the following vacancies. Both would suit newly-qualified young men wishing to broaden their experience and at same time enjoy living in this pleasant and stable part of Africa.

1. SENIOR ESTATES OFFICER

Applicants should be members of R.I.C.S. Duties will include the management, under the control of the Chief Estates Officer, of a large and comprehensive property portfolio including residential, industrial, commercial and government premises.

2. ASSISTANT CHIEF ACCOUNTANT

Applicants should be qualified chartered, certified or cost and management accountants. Duties will be to assist the Chief Accountant with the preparation of quarterly and annual accounts of the corporation and its seventeen property-owning subsidiary companies. Some experience of consolidations will be an advantage. Additional interest will arise through involvement in budgeting, cash flows and ad hoc investigations.

The remuneration package will include a salary in the range MK 13,500-MK 15,000 (approx. £7,700-£8,600) with annual increments of MK 1,000. Terminal gratuity of 25 per cent basic pay and leave pay (at present tax free). Local leave of twelve working days per year plus terminal leave of four days per month, baggage and settling-in allowances, excellent three bedroom house and garden with hard furniture at nominal rent, car loans, education allowances, medical aid scheme, personal accident insurance.

Contracts are for a three-year period.

Malawi is a landlocked but beautiful country with lakes, mountains, game reserves and ample opportunities for leisure activities.

Applications giving full details of qualifications and experience to:

The General Manager,
CAPITAL CITY DEVELOPMENT CORPORATION,
P.O. Box 30139, Lilongwe 3, Malawi.

Jonathan Wren - Banking Appointments

The personnel consultancy dealing exclusively with the banking profession

BANK EXECUTIVES - NIGERIA

Our client is an established bank in Nigeria under European management. The bank maintains a branch network in Nigeria and seeks to strengthen its management team by recruiting the following officers:—

1. AREA MANAGER - LAGOS to £39,000 Sterling Equivalent
Responsibilities include management of the main branch and five other offices.

It is anticipated that the successful candidate will be in his mid-to-late thirties with considerable commercial banking experience. It is an essential requirement that candidates should be qualified as Associates of the Institute of Bankers or hold a University degree in Business Studies, Accounting or Economics. Experience in business development in the trade finance field would be very useful.

2. CREDIT MANAGER (Two Vacancies) to £31,000 Sterling Equiv.
Responsibilities involve the management of credit departments, one vacancy in the main Lagos Office and the other in a Regional Office. Good experience in commercial lending is important, either in the U.K. or overseas. Duties will include the review of new and renewal facilities, control of staff in credit department and management of facilities at all stages. Candidates should be graduates or hold the A.L.B. as in the Area Manager vacancy.

The benefits packages in addition to the salaries mentioned are considerable, including free housing, medical fees, 60 days annual holidays with economy return fares for the family, etc. The initial contract will be for two years, renewable subject to all parties' agreement.

Please contact DAVID GROVE in the first instance.
All enquiries will be treated in strict confidence.

First floor-entrance New Street
170 Bishopsgate London EC2M 4LX 01-623 1266

Senior Assistant Director Scotland £7000+ plus car

The Confederation of British Industry is replacing the senior Assistant Director in its Scottish Office in Glasgow.

The purpose of its Scottish Office is to enable member firms to contribute to the development of CBI policy, to represent the CBI and its policies to companies, the public and the Government and other authorities in Scotland, to speak on behalf of members there, and to help with the recruitment of members to the CBI. Under the Director in Scotland the senior Assistant Director will work in all of these areas, with responsibility for the Office in his absence.

The successful man or woman

should be able to deal with business executives at all levels, master policy issues, market CBI and its policies, and communicate effectively both orally and on paper. A knowledge of Scottish industry and law would be an advantage as also experience of committee work.

Salary £7000 per annum or more to take account of experience. A car will be provided.

Initial interviews will be held in Glasgow or London, as convenient. Application forms from Sue Bridgitt, Personnel Division, CBI, 21 Tothill Street, London SW1H 9LP (telephone number: 01-830 6771).

The Confederation of British Industry
Britain's Business Voice

PERSONNEL DIRECTOR
ENGLISH NATIONAL OPERA

Due to the retirement of the present incumbent this key appointment in industrial relations falls vacant in December, 1979.

Responsibility is to the Managing Director for all aspects of the Company's personnel policy. The ENO is one of the country's leading opera companies which employs approximately 500 people. In addition to the day to day personnel functions, the Personnel Director, maintains on the Company's behalf correct relations with the Trade Unions, Equity, Musicians' Union, NATTK, and is personally involved in negotiations both at National and House level.

The successful candidate will have a background of business decision making and will be up to date in employment legislation and related matters. Suitably qualified people should submit a cv. appointment is negotiable.

Applications will be treated as confidential in the first instance and should be made to the Managing Director, English National Opera, London Coliseum, St. Martin's Lane, London WC2N 4ES.

INFORMATION SYSTEMS
TO COMMODITY TRADERS

We are part of a large international group providing specialist information services by teleprinter and video-systems to more than 7000 clients around the world.

In our next phase of expansion, openings are being created in European Marketing Offices in London and on the Continent. The people we are seeking should have commodity trading or shipping experience and should be fluent in at least one European language other than English. If you are between 25-30, enthusiastic and prepared to travel we would like to hear from you. Salary negotiable.

Send full C.V. to Miss Beverly Day
UNICOM NEWS
72-78 Fleet Street London EC4Y 1HY

A leading firm of stockbrokers,

active in international markets, has vacancies in their general office for clerks fully experienced in both domestic and international settlement procedures. The appointments will be competitively remunerated and there is a non-contributory pension and life assurance scheme. Applicants should write giving age and details of previous experience to:

Box G.4672, Financial Times,
10, Cannon Street, EC4P 4BY.

MARKETING REPRESENTATIVE

Leading American Avionics Manufacturer is seeking Paris-based qualified Marketing Representative for Europe and Africa. Duties would include marketing navigation and other avionics equipment to civil airlines and military air forces. Fluency in English absolute requirement, with knowledge of French desirable. Please send in strictest confidence CV, salary requirements and picture to: Box F.1158, Financial Times, 10, Cannon Street, EC4P 4BY.

SEPTEMBER, 1978 I WAS BROKE

now I drive a Rolls, have a house in London and a boat in Sussex. If you are twenty to forty you can do it too. Phone Barry Novis on 01-637 1845 or 01-636 1492 or 01-580 3318.

MANAGER (experienced) required for £12 million fund and company member centre - THE ALBANY - due to retire in 1980. Must be a qualified accountant. Part or full time. Salary and benefits negotiable. Write to: JESSIE HARRIS, The Albany Empire, Creek Road, London SE2.

Top Executives

If you are finding your talents wasted - we can help.

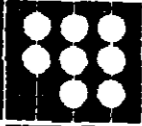
In the serious business of marketing yourself MINISTER EXECUTIVE provides the professional, individual and comprehensive career counselling service that has achieved outstanding results. After evaluating your full potential we direct you through every stage of the 'job search', furnishing you with material individually tailored to your specific needs, and counsel in the art of being interviewed.

As professionals we have an acknowledged standing in the employment market. We invite you to a preliminary discussion to discover why our clients have been so successful.

MINISTER EXECUTIVE LIMITED

28 Bolton Street, London W1Y 8RB. Tel: 01-493 1309/1085

£6,000 accountancy appointments £9,000



TAX EXECUTIVE

Switzerland SF Neg. A multinational company occupying a leading position in its field seeks a Number 2 to its European Tax Manager whose orbit embraces all EEC countries, Eastern Europe and the Middle East.

LOW TRAVEL AUDIT

W. London £9,000 + Benefits The newly appointed Audit Manager of a household name U.S. manufacturing group seeks to strengthen his team.

LINE PROSPECTS

Herts £8,000 + Car Young ACAs seeking commercial experience will be particularly attracted to this interesting and varied position with a well-known service group.

FINANCE SECTOR

C. London £9,000 + Profit Share Previous incumbents of this position have been promoted internally or secured external appointments due to the excellent training received in this well-known firm of stock brokers.

CONSULTANT

London £8,000 An excellent opportunity for a newly qualified accountant to move into a non-audit consultancy function.

ROBERT HALF Accountancy & financial personnel specialists

CITY OFFICE OPEN TO 6 P.M. DAILY AND THURSDAYS TILL 7 P.M. WEST END OFFICE LATE OPENING THURSDAYS TILL 9 P.M.

COMPANY ACCOUNTANT

SEI £9,000 Our client, an expanding engineering company, is seeking to recruit a qualified accountant. The successful candidate will report to the Managing Director and be responsible for all aspects of the accounting function.

DUNLOP AND BADENOCH (AGY) 37 Eastcheap, EC3 01-423 3544/5/4 31 Percy Street, W1 01-323 0886



The last hurdle?

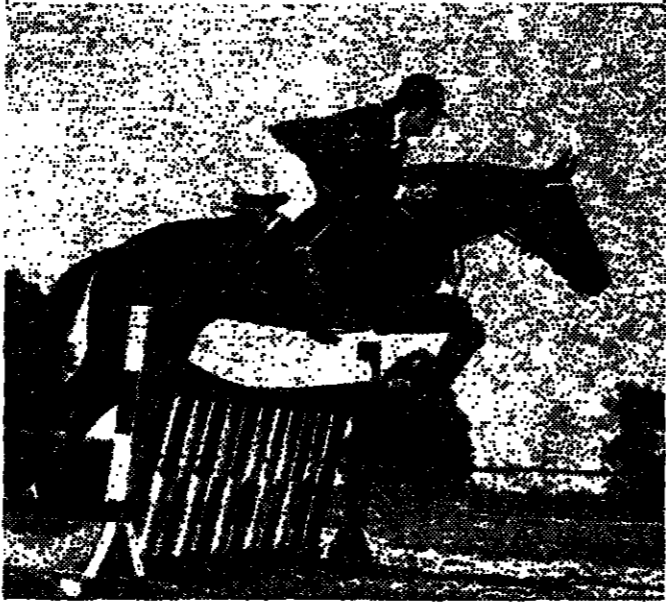
...you will find at Josolynes, like most successful practices, we have a broad range of clients - private, public and institutional. Our strength lies in the close working relationship we have with our clients - and with our staff.

Qualification is only the first major hurdle of your professional career, but as part of a uniquely experienced team, you will be able to take the most daunting obstacles in your stride.

Be ready for your next hurdle, discuss your future with Roy Ashwell on 01-636 7777.

JOSOLYNE LAYTON-BENNETT & CO.

Metropol House, 39/45, Tottenham Court Road, London W1P 0JL. Associated offices throughout the UK and the world.



H. P. INGLEDUEW AND COMPANY LTD.

Adam Street off Bowfield Lane, Stockton-on-Tees. MANAGER - FINANCE AND ADMINISTRATION

The company operates a serious and a non-serious foundry, the latter having recently been commissioned. We wish to recruit urgently a qualified accountant to fill the above position.

CHARTERED ACCOUNTANT

The London branch of a leading West German bank is seeking a Chartered Accountant with bank audit experience (with particular emphasis on foreign exchange accounting).

Please contact Mrs. Loveday with brief details of career to date. WESTDEUTSCHE LANDESBANK GIROZENTRALE, 41 Moorgate London EC2R 6AE (Telephone 01-638 6141)

APPOINTMENTS

Buying director for Debenhams

Mr. Brian Richman has been appointed to the main Board of DEBENHAMS as buying director for the non-textile divisions. Areas under his control include upholstery, furnishing and furnishing textiles, furnishing decor, bedding, china and glass, lighting, major and minor electrical goods, kitchens and kitchen equipment, DIY, gardening, audio, video and hi-fi, sports goods and clothing, toys, stationery and travel goods and confectionery.

Mr. Barry P. Cutlum has been appointed managing director for MORGAN BERKELEY COMPANY, a company in the Norcem Offshore Group.

Mr. Arthur W. Venables has been appointed managing director for OIL COUNTRY SUPPLIES, a company in the Norcem Offshore Group.

Mr. James H. Scott, a vice-president of Morgan Guaranty International Finance Corporation, has joined BANK MORGAN LABOUCHERE NV as a manager. He joined Morgan Guaranty Trust Company in 1973.

Mr. G. A. Clark Hutchison will join the Board of ATTDCK PETROLEUM as an executive director on October 16.

Mr. R. J. Emerson has been appointed a director of ASTRA GAMES and remains manager of the company. Mr. E. N. C. Eastman has been appointed company secretary.

Mr. Ashley R. G. Raeburn has been appointed a vice-chairman of ROLLS-ROYCE. He joined the Board in January 1978.

Mr. Michael Bromhead has been appointed to the new position of managing director of EMI FILM DISTRIBUTORS OVERSEAS. Mr. Hanna Medawar, the senior overseas sales representative, has been appointed assistant managing director.

Mr. William J. Sinkala has been elected vice-president finance for THE KROGER COMPANY, Cincinnati. Prior to joining Kroger, he was senior vice-president-administration for Western Auto Supply Company, Kansas City, Missouri, which is

responsibility for exploration and production and Burma's interests in the Indian sub-continent. The new directorship will bring all of Burma's oil interests under one directorate. Mr. Keith F. D. Wilson has been appointed managing director of BURMAH-CASTROL UK. He joined Burma in 1956. In 1976 he was appointed commercial director, Castrol worldwide.

Mr. George Brimyard, port services director of the MERSEY DOCKS AND HARBOUR CO., is leaving on early retirement - no further details were given. Mr. Brimyard (47) joined the former Mersey Docks and Harbour Board from British Rail in 1970. Mersey Docks has announced other operational changes. Mr. J. C. Marshall, planning director, becomes port services director, covering engineering, marine and pilotage while retaining responsibility for planning and consultancy. Mr. A. M. Henderson, finance director and chairman of the Port of Liverpool police committee, assumes responsibility for police and security, and Mr. A. Lynch, administrative director, becomes personnel and administration director and assumes responsibility for the estate department.



One of the barrels our client won't be needing.

"As a direct result of installing (Martin Roberts PVC Strip Partitions) in our factory, we have recorded a saving of 57,000 gallons of oil over the corresponding period last year.

This saving represents a 51% reduction in consumption with the obvious considerable savings in our fuel bill." P. Percy, Esq., joint managing director, B.Y.C. Rollmakers Limited, Bolton.

And that doesn't say it all. Martin Roberts guarantee the lowest prices in Britain for PVC Strip Doors and Curtains. And the fastest delivery - despatch in 72 hours, from flow-line round-the-clock production. Design flexibility second to none. All in top quality materials.

Martin Roberts are innovators and achievers. They make Safeweld mobile welding screens and booths. And they've started the 'quiet revolution' with

new Soundguard sound attenuation systems. Increased work-hours, increased safety, industrial peace at a small price.

While fuel bills and other manufacturers' prices soar, Martin Roberts reduce theirs again and again. One reason why they're Europe's biggest manufacturer of PVC Strip Doors. Even if they are an oil-based product! They'll help you achieve the kind of savings you only dreamed of.

MARTIN ROBERTS STRIP DOORS Martin Roberts Limited, Southampton, Kent ME10 1AR. Telephone: Southampton (0776) 76161. Telex: 805638. Representatives throughout the UK, Eire, Europe and the Middle East. The Queen's Award for Export Achievement 1978 to Martin Roberts Limited.

COMPANY NOTICES

JOHANNESBURG CONSOLIDATED INVESTMENT COMPANY, LIMITED (Incorporated in the Republic of South Africa) NOTICE TO HOLDERS OF SHARE WARRANTS TO BEARER DIVIDEND NO. 107

NEWFOUNDLAND MUNICIPAL FINANCING CORPORATION U.S.\$35,000,000 9 1/2% 1978/1988 BONDS

PUBLIC NOTICE DEVON COUNTY COUNCIL BILLS totalling £5m will be issued on 9th October, 1979.

LEGAL NOTICE

THE COMPANIES ACTS 1948 TO 1976 MAYSTAR TRADING COMPANY LIMITED NOTICE IS HEREBY GIVEN, pursuant to section 293 of the Companies Act 1948, that a Meeting of the Creditors of the above-named Company will be held at the offices of LEONARD CURTIS & CO.,

LECTURES GRESHAM LECTURES IN ASTRONOMY SUNSPOTS AND ICE AGES by Professor D. W. Dewhurst

PLANT AND MACHINERY Auction of modern heavy stamping and other plant and equipment, tools and dies formerly of Kirby Manufacturing & Engineering Company Limited

AUCTION SALE REMINDER Auction of modern heavy stamping and other plant and equipment, tools and dies formerly of Kirby Manufacturing & Engineering Company Limited

CONTRACTS AND TENDERS

ARGENTINE REPUBLIC MINISTRY OF ECONOMY STATE SECRETARIAT OF ENERGY Hidronor S.A. Hidroeléctrica Norpatagónica Sociedad Anónima Alicopa Complex Alicurá Hydroelectric Project

ART GALLERIES

ANDREW WYLD GALLERY, 3, Cork St. W1 1JG. PETER DE WINT, Monday 10-12.30. GROWSE & DABRY LTD., 18 Cork St., W1. THE SMITH CENTENARY EXHIBITION, 7th St. November. CAMPBELL & FRANKS FINE ARTS, 37, New Cavendish Street, W1, 01-486 1455.

COULD YOUR BUSINESS BE ON THE WAY OUT?

If your company's located in the middle of some vast industrial sprawl you could be forgiven for thinking that Central Lancashire is a little 'out in the sticks'. But in fact, the area houses three of the North's most attractive industrial sites.

So there's bound to be one that's just right for your company. All the sites have full services laid on, as you'd expect. But what may surprise you a little are the fine standards of building design and layout, the carefully planned access roads, and the green, landscaped settings in keeping with the rural surroundings.

Form for requesting details of Central Lancashire industrial sites, including fields for Name, Position, Company, Address, and Post to: W. McNab, F.R.I.C.S., Commercial Director, Central Lancashire Development Corporation, Cuesden Hall, Bamber Bridge, Preston PR5 6AX. Telephone: Preston (0772) 38211. FT 5/10

Technical Page

EDITED BY ARTHUR BENNETT AND TED SCHOETERS

● VENDING

Exact change is not required

NOTHING can be more frustrating than to stand in front of a full vending machine (with an empty tum) and have coin after coin rejected either because the machine's detection equipment is faulty or because the selection mechanism is so rudimentary that it cannot deal with more than one or two combinations of change.

Whatever the causes of failure to deliver the goods, they frequently result in direct physical assault on the machine, or if this is not possible, a great deal of aggravation.

Mars Money Systems has been active in coin equipment for many years and its latest piece of technology should go a long way to solving the frustrations just described. It is called Mentor 3000 and is described as the UK's first all-electronic change-giving unit.

Its principle of operation is simple—if the user has not the exact change to hand, the unit will allow him to insert available coins to a higher value and make a selection receiving the difference in change with a minimum number of coins.

The newly launched machine will take 1p, 2p, 5p and 10p coins and can be set for four prices between 1p and 50p, using very simple slider switches.

Early next year, a version suitable for snack and food vending, taking the 50p coin, will be made available.

The validating unit, with which Mars has gained considerable expertise since it released the world's first electronic version some ten years ago, will be able to work on the £1 sterling coin when it becomes legal tender.

Mars is making some significant claims for the Mentor, not the least of which is for a one-year pay back as a result of increases in sales and the elimination of wall-mounted change machines.

The latter point arises from the fact that while 10p coins go automatically to a cash box, and accepted are fed automatic-

ally to change tubes. There is obviously less cash to collect and sort.

Looking further ahead, Mentor will make the advent of fully automatic shops a much more feasible proposition while giving a guarantee that the incidence of unacceptable foreign coins or false coins will be very greatly reduced.

It has taken several years to develop an electronic change unit which will deal with 95 per cent of the world's coins. Mars has simultaneously launched a digital display that would be linked to the electronic coin mechanism to show the user just what point he has reached in the transaction and what change he can expect to receive.

Further information on the two products from Mars Money Systems, 266 Bath Road, Slough, Berks, SL1 4EB, Slough 70921.

Dispenser is easy to alter

CONTROLLED BY a unit which looks like a pocket calculator, a drinks vending machine to be put through its paces at the International Business Show in Birmingham later this month can be set up to dispense up to 12 beverages.

Micro-controlled, it will take all available types of vending cups for in-cup services and any combinations of drink selections, prices and product mix can be programmed. Changes are made in a few seconds by reference to a simple coding chart.

Up to 1,000 cups at one filling is possible with drinks priced between 0 and 99p. The controller automatically counts and records all cash.

The machine will show a sold-out sign against any exhausted product. It will also react should a motor or micro-switch fail and put a coin block or blocks on the affected section.

Vendos, Tilson Road, Industrial Estate, Wythenshawe, 061 996 9081.

● SOFTWARE

Bid for high stake in Europe

IN A MOVE which could take it into high profitability over the next five years, the CPP software arm of the UK's CAP- CPP group has released four software products intended to improve the operating efficiencies of the machines on which they are installed and/or give users tighter control over their equipment by providing a better analysis of how it is working.

At the same time the company has reorganised its European sales effort and set up new companies in Germany, Holland and Belgium.

These moves are the aftermath of the U.S. onslaught on Europe in which American providers of software products are gradually working off their licensing arrangements with a number of UK companies through which the Americans were selling in Europe, in favour of selling directly themselves.

The U.S. software drive has been extremely successful. According to Kevin Hughes, European operations manager of CPP, as much as 80 per cent

of the systems software now being used in Europe is actually supplied by U.S.-based companies—the new CPP products are entirely European-designed.

Target for CPP (and its competitors in this area of system products) are the close on 12,000 IBM user sites in Europe, of which half are immediate aiming points for the four CPP products just launched.

Let this appear presumptuous, it must immediately be said that a recent IDC survey of European users turned up the interesting statistic that on all these IBM sites, over 70 per cent of managers are either using or considering independent software.

If one sets against this the declared IBM corporate intention that by the mid-80s IBM will be drawing half its revenue from software products, the battle lines can be drawn immediately.

CPP does not expect the independents to get more than 30 per cent of this market but, nevertheless, 30 per cent will represent "billions of dollars".

Hughes said. Meanwhile, CPP is the largest of the European software product groups and the inference is that its growth will be very rapid, particularly if European Governments lean on state-controlled and nationalised organisations, requiring them to use home-made software products in an attempt to plug the huge European data processing deficit.

CPP's four products come under the heading "Improve" and provide identification of bottleneck areas in batch work, appoints those users of programs which are not running smoothly, monitors on-line operations as they proceed—with alarms set at user-chosen points, and give the possibility of automating the job-loading operation over periods of many months.

CPP has the backing of close on 900 professionals in its parent and associate companies. This "brain force" is the company's main reason for optimism.

CPP (UK), Hollybake House, Hollybake Place, 31 Hill Rise, Richmond, Surrey, 01-848 4272.

● DATA PROCESSING

Intelligent network

IN A MOVE that will create a large distributed processing network, Computer Factors is supplying six Honeywell Minis to Blunell Permaglaze.

Scheduled for installation from December the computers will be located at depots throughout the UK, primarily to deal with order processing and stock control. In addition they will handle counter sales, despatch notes and invoice printing.

The machines consist of Level 6 Model 43 processor, 96k Words of memory, a 180 cps printer, 10 Megabyte disc drive and two or three VIP 7250 visual display units, dependent on the size of the depot. A central Level 6 processor equipped with a 7 track magnetic tape drive will be installed at the London headquarters. This will be used to control the network and communicate with the existing large Honeywell machine.

Equipped with "autocall" the central Level 6 will automatically dial all the depots on a daily basis. Each will transmit details of the day's transactions to provide management information, production requirements and sales statistics. Subsequently, changes to the product and customer master files will be transmitted back from the centre to the depot.

Computer Factors, Marshall House, Manor Road, Coventry CV1 2GF. 0293 58318.

Dispenser is easy to alter

● ILLUMINATION

Floodlight source

SUGGESTED FOR night working on construction sites, airfields and as security lighting, in conditions ranging from arctic to tropical, is a totally self-contained, mobile, temporary or emergency floodlighting unit from Hawker Siddeley Group, 32, Duke Street, St. James's, London, SW1 10J (01-820 6177).

Lighting array consists of four 1,500 tungsten halogen lamps in fully adjustable, stirrup mounted, weatherproof floodlights giving 970 square metres illuminations at 70 lux—high pressure sodium lamps are available as an option, if greater light output is required.

The assembly is mounted on a nine metre, three section telescopic latic mast with simple but safe equipment for lifting and extending, says the company.

● PROCESSING

Handling of waste water

WANSON Company of Borehamwood, Herts, has a multi-stage evaporator condensers for the recycling and reprecipitation of industrial waste water.

"Sillipear" equipment has taken several years to develop and the company expects steady operation of a number of units, including some at day-hour premises.

Three main considerations were to save on raw water consumption and therefore, the initial treatment of this water, to eliminate environmental pollution by industrial effluent without large capital and space requirements and to improve the thermal efficiency of the recycling process by utilising much of the heat normally lost when hot polluted water is discharged to waste.

An added advantage of the Sillipear design which WanSON is currently investigating is the possibility of extracting the calorific value of the sludges obtained from the final stage of the distillation process, by burning it with the factory boiler fuel. The energy required for the process is provided by steam or thermal fluid.

WanSON Company, Borehamwood, WD6 1SA, 01-953 7111.

● POLLUTION

Oil recovery method

SUCCESSFUL trials with a prototype "Oceanic" spilled oil skimmer system have persuaded the Royal Navy to commission several units for MoD harbour duties.

The design and the know-how acquired during the development programme is available for civil exploitation on a commercial basis under NRDC licence. The skimmer has the advantage that it can be controlled temporarily diverted from normal duties.

Oil concentration is achieved by a pair of inflatable booms 40 metres long deployed in a "V" shape ahead of the skimmer. These can be anchored in position so that the oil film is borne into the V by the current, or can be towed by a pair of small craft. An oil film 1mm thick swept up by booms 25 metres apart at their mouth should be concentrated to a workable thickness of 25 mm if the apex of the V is 1 metre wide. Trials have established the best boom profile to produce smooth concentration and the skimmer uses an inverted weir with a variable aperture to effect recovery of the concentrated oil. This is simpler than adhesion techniques involving moving belts or discs from which the clinging oil

film is scraped or squeezed. The weir is carried between a pair of cantamaran hulls with its lip on the waterline. The longitudinal position of the weir is designed to coincide with the centre of buoyancy of the skimmer. A wave damper ahead of the weir deflects waves down to the collection point. An adjustable horizontal weir plate just below the weir edge is set so that the gap between the weir and the plate matches the thickness of the oil. The oil is then sucked through the air using one or both of the lightweight Splate pumps mounted within the hulls. These are preferred to centrifugal pumps, which tend to emulsify the oil.

Since the weir plate is the only "moving" part of the skimmer, repair from the pumps, the system is robust and simple to operate. An ultrasonic device for monitoring oil thickness just ahead of the weir has been devised by Mr. F. J. Clinick of the MoD's Ship Department Section and this enables the skimmer operator to achieve oil recovery rates as high as 80 per cent. This device is offered for commercial exploitation under NRDC licence.

National Research Development Corporation, Kingsgate House, 66-74 Victoria Street, London SW1E 6SL. 01-828 3400.

Environment guard

NEXT YEAR'S International Environment and Safety Exhibition and Conference to be held at the Wembley Centre in London from September 1 to 4 will be an extremely broad event ranging, as it will, over the problems of water and air pollution, vehicle design and the environment, use of land and its abuse through waste disposal, and the management of energy resources.

It will inevitably spark off heated debate on the environmental problems of power generation, especially the serious problems of nuclear power, but also those created by long-distance transport of

smoke plumes from large fossil stations.

Special attention will focus on the session devoted to safety and health in the workplace following the various incidents involving asbestos, plutonium and lead, among other noxious substances that have taken place in recent months.

There will be 170 stand units at this busy event with its special features, including a program of "Industrial Environment and Safety Magazine" and "Coalition".

More details from the Conference Organiser at Newcastle, Sandil Lane, St. Athans, Herts. AL4 6BS.

Sticky dust removed

HIGH CAPACITY fume scrubbers which effectively stop air pollution and permit recovery of valuable chemicals, are newly on the market.

The new scrubber is an extension of an existing series 770 and can be operated without a fan or pump. The flow of scrubber liquid creates its own suction for drawing in the fumes, thus dispensing with the fan. The new scrubber develops a

static pressure of six inches water gauge external to the system, a significant increase over the two inches or so previously obtained. This increased flow rate and suction provides both greater capacity and greater scrubbing efficiency for "sticky" dusts and fumes requiring a high volume of liquid for absorption.

Reidco (UK), Hacclecote, Gloucester.

Lovell
for construction
01-995 1313

● INSTRUMENTS

Static test

IT HAS always been possible for a static charge to deal a fatal blow even to a discrete transistor, and the problem gets worse as the size of the active elements on modern integrated circuits gets smaller and smaller.

If a source of static charge build up is suspected, a instrument from Curve Systems will discover both location and polarity even when the field strength is as low as 50 volts/cm. Once the build-up point is switched on a green light is displayed. As the instrument approaches a charge or a source of ion emission a red lamp momentarily comes on and the green one fades, indicating the presence of ionisation charges.

The unit runs from a small battery and its dimensions are about 120 mm high, its weight is 105 x 85 x 20 mm and weight, 100 gms.

More from The 15, Suttons Industrial Park, London Road, Epsom, Surrey, Surrey E9 6AZ (071 896055).

Sees shorts

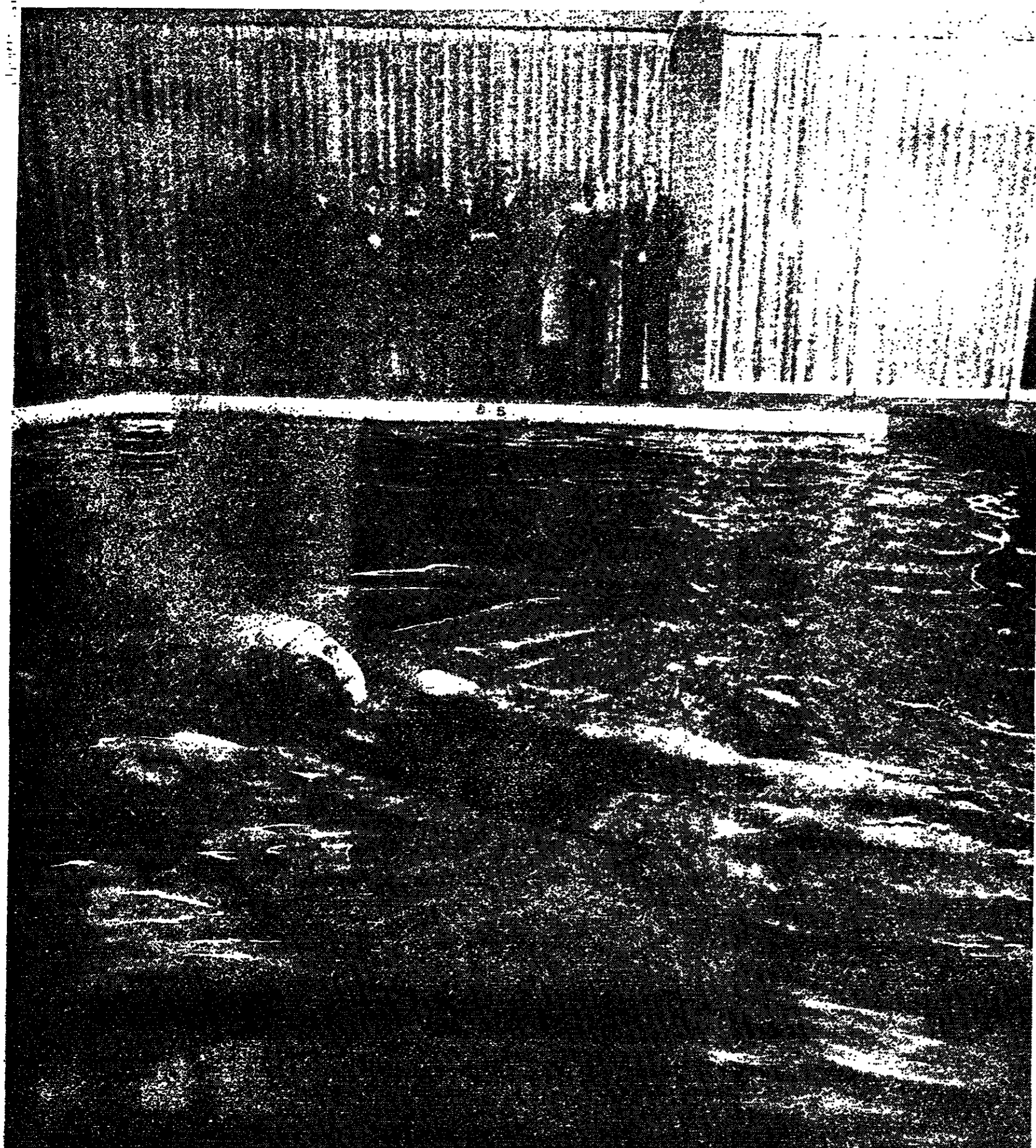
ALTHOUGH a short circuit may be known to exist between a pair of conductors in a circuit board, the exact location is another matter.

A small test tool from Omnitest, London, makes the task of finding and identifying faults on a PCB a lot easier. It is a probe connected to a micro-meter with an anti-dust force constant as well as a front panel meter.

The user does not have to look at the meter; instead, a pair of probes are moved in turn, along the two electrical tracks of a PCB and the engineer listens for the loudest tone. The location of the short can be found to within a few millimetres.

Using the probe, resistance measurements taken from 200 ohms down to 100 ohms can be carried out. Its probe ranges 5 kV and its force constant and built in piezo-electric resistor provides a built-in force constant.

More from A.I. Instruments Road, Hillside, Christchurch Road, Blyth, Cambs CB3 5EN (04282 77311).



POOLS WINNERS

How ICI took a successful plunge into a £300 million market with an invention for making pools better and safer to swim in.

As he stood beside a colleague's pool on a visit to ICI in Australia, Tony Hinton had a brainwave.

The pool was clear and clean, although it had not been attended to all winter. This was the effect of one of the products made by his ICI Division, Organics in Manchester, which the Australians had added out of curiosity the previous autumn.

This chemical was highly specialised, designed to sanitise solid surfaces in the catering and brewing industries, including pub glasses—relatively small beer in sales terms.

Now, suddenly, he saw new possibilities. Could it be modified as the first effective alternative to chlorine to purify pools? It would have the advantages of no irritating smell or unpleasant taste and only small and less frequent doses would be needed.

The owners of the world's three million private pools—from Sydney to San Francisco—were the market.

A vast opportunity. But the difficulties which ICI now faced were equally big. The product, derived from a wartime anti-malarial breakthrough by ICI, was one of a group of chemicals called biocides. They deal with harmful bacteria and fungi in the way sprays deal with garden pests. And they remain environmentally safe.

The technology of biocides is fiendishly complex. To develop the swimming pool application required concentrated work by a team of specialists at Organics Division in microbiology, bio-chemistry, polymer, physical and organic chemistry, toxicology, marketing...

They called the result "Baqacil SB". It was put on trial initially in about 1,000 pools. Then, later, it was proved in several thousand pools in France, rather than just survive.


Australia, Spain and Britain over a 4 to 5 year period. In the early 70's, long term toxicity tests were set up to satisfy health and safety regulations.

Last year it was launched into Queensland and South Australia, France, Spain and Britain. Its success means that this year it will go into the rest of Australia and Western Europe, with other countries soon to follow.

In 1975 only 5 tonnes were sold. Now, because of worldwide demand, a £3 million investment has been made to increase output from the plant at Grangemouth, Scotland.

The benefit of this new product is more than pleasant pools. Thanks to their effort and 'know-how' an ICI team is securing for Britain a stake in a £300 million world market.

It's enterprise like this we need if we are to thrive, rather than just survive.



Tony Hinton of ICI and customers beside a Baqacil treated pool at a Holiday Inn Hotel.

مكنا من الأهل

THE MANAGEMENT PAGE

EDITED BY CHRISTOPHER LORENZ

WE HAVE all heard the story before. Old-established British engineering company with a name respected widely for its quality and service falls on hard times in the Seventies because its product is out-of-date. The company has failed to invest enough in engineering and its markets have simply evaporated. Word then gets around that its workforce is "uncooperative."

David Fishlock on how Negretti and Zambra hopes to extricate itself from a vicious circle

Leapfrogging into the eighties

He has no illusions about the company's recent financial problems—many of which concerned his own division. When he was brought in 16 months ago, the division was behind on deliveries to the tune of £1m on a turnover of £5m. And no one was being held responsible for meeting those deliveries.

by the readiness with which the majority responded to his assurances that, with the help of the NEB's cash, they could be retrained to make the new product.

financed by a basic grant from the government, the laboratory has long been encouraged to do research under contract for industry. In support of its processing it has built up a strong control engineering division.

Department of Industry for joint funding between company and government. For the company it meant development grants worth almost £100,000—50 per cent of the cost. Again the British Sugar Corporation has been its first customer.

Already the MPC 80 accounts for a third of Mooney's sales. But he sees a continuing demand for the traditional mechanical type of instrument made by his company, not least because it is intrinsically safe—it needs no power supply, for example. His problem is how to break away from the craft approach to manufacture, with each instrument individually "tweaked" to the perfect performance a craftsman can provide.



Bryan Mooney (left) and John Hope

GEC, where he ran the medical engineering division for six years. The new challenge, he says frankly, is to tackle a company that has got deep into trouble.

PUNITIVE taxes, soaring inflation and a sagging currency have long been the complaints of British executives. But these days the loudest laments in the United Kingdom are coming from what has traditionally been one of the most cosseted sectors of the business community—U.S. expatriates.

U.S. expatriates start to feel the pinch

BY SANDRA SALMANS

foreign-earned income of U.S. citizens has always been subject to U.S. taxes, until 1978 an American living abroad could exclude \$20,000 of that income (or \$25,000, if he had lived abroad for more than three years) from U.S. taxes.

or the difference in cost between maintaining an American lifestyle in the U.S. and doing so abroad, as calculated by the U.S. State Department.

Taking a married U.S. executive with two children and a \$50,000 base salary, \$20,000 in overseas allowances and \$5,000 in unearned income from interest and dividends, Mr. Espovitch calculates that, with the \$20,000 exclusion allowable before 1978, the total tax liability was \$14,700.

equalisation" scheme. The theory behind tax equalisation is that a U.S. employee abroad should pay the same amount in taxes as he would have incurred had he remained in the U.S., neither profiting nor losing from his overseas transfer.

well as any salary earned by his wife, into a higher tax bracket. In the case described, where the executive has \$5,000 in unearned income, he might have to pay an extra \$300 of his own money in additional tax.

arrives at an index by pricing a "market basket" of 170 different goods and services—ranging from cornflakes to Underground fares—in London and Washington.

the basket and the time the index reaches their corporate clients. The clients, in turn, may delay a month or more in applying the index to expatriate paycheques.



Advertisement for Diamond Data Recall Limited. Features a large image of a computer terminal and text: 'Designed in keeping with its company', 'From the outset, we knew that designing even a superior word processor wasn't enough...', 'See us at the International Business Show, N.E.C. Birmingham, Hall 2, Stand No. 655/664, 23rd October - 1st November.'

Advertisement for Wilkinson Transport. Features large text: 'Your present parcels service. Is it all parcels and no service?'. Text includes: 'Any comic with a couple of slow vehicles and a fast line in chat can call himself a "parcels service"...', 'Wilkinson Transport Ltd., Head Office: Ringway House, 45, Bull Street, Birmingham, B4 6DP. Tel: 021-238 9773/7. Telex: 339165.'

LOMBARD

Home thoughts from abroad

BY PETER RIDDELL

THE CONSERVATIVES' attempt since May to change the direction of UK economic policy appears to be viewed with fewer reservations by the financial community abroad than at home. That at any rate is my broad impression from talking to a wide range of bankers and officials attending the IMF annual meeting in Belgrade earlier this month.

There are also some doubts, especially among some Continental bankers, about how the Government will deal with the unions. Yet it appears that those who heard Sir Geoffrey's speech were impressed. The attitude of the poorer nations, especially those represented at the Commonwealth Finance Ministers meeting in Malta in late September, was more favourable towards the UK than might have been expected. This was slightly surprising since Sir Geoffrey had explicitly challenged the prevalent view about overseas aid and he said the level of spending in this area would have to be constrained by domestic political opinions and economic circumstances. The explanation is probably that the UK's standing with the less developed countries has been helped by Britain's initiative on Zimbabwe at the Lusaka conference and afterwards.

Differently

The UK role was less publicly obvious than recently in the absence of Mr. Denis Healey who played an important and intellectually stimulating part in the Fund's affairs as chairman of its policy making interim committee. Sir Geoffrey Howe deliberately chose to play the meeting differently. Listening and meeting people, he probably scarcely noticed except by those specifically watching for signs of the new Tory style. Moreover, Sir Geoffrey is openly sceptical about international initiatives from bodies like the IMF since he believes that any solutions to world economic problems must be generated within individual countries.

Yet if the UK and the Chancellor were in the background during the meeting, there was still some interest in the Conservative experiment as such. My general and inevitably over-simplified impression was that overseas bankers and officials, a far from homogeneous group, believe that Mrs. Thatcher's administration has shown boldness and they wish her well. They believe that Labour (and in particular, Mr. Hesley) had done a lot to stop the rot after 1976 and that the Conservatives now offer the hope of building on that start.

There is clear overseas support for the proposed reduction in the size of the public sector and for the cuts in the higher rates of income tax. But

THE WINES of Umbria have tended to be overshadowed by those of neighbouring Tuscany, celebrated above all for Chianti, but including others well-known such as Brunello di Montalcino and VINO Nobile di Montepulciano. Moreover in the public mind at least until recently, Umbria has been a one-wine region—the white wine of Orvieto. This palatable but not exceptional wine has suffered competitively from the much better known and more widely marketed Soave, Frascati and Verdicchio.

Pasteurised

I must confess that when, in the early 1970s, I visited the delimited area of Orvieto (within which lies a "classico" district) I was in general rather disappointed: with the wines, since in almost every firm's cellar that I visited—and there are only six or seven producers of any size producing most of an annual average of about 60,000 hectolitres (hl)—I found the wines, rather heavy, dull and lifeless.

One main cause of this was that to ensure stability and prevent secondary fermentation in bottle, they were nearly all pasteurised. Instability is always a risk with white wines, particularly if they retain a medium acidity, sweetness, and Orvieto is marginally sweeter than Soave and Verdicchio, especially the

Another large firm, Bigli, which belongs to the huge Wine Food group, no longer pasteurises its wine. Their 1978 was dry, firm and again slightly petulant. The Castello della Sala Orvieto is as crisp and fresh as ever, though in the early summer I found the 1978 still a little green. I am inclined to believe that when dry Italian whites are well made they can improve

WINE BY EDMUND PENNING-ROWSELL

After a little time in bottle. For freshness is not all. Orvieto is basically made from the Tuscan Trebbiano grape and the Malvasia, also employed further north, but some Grechetto, Verdello and Druppigno are added, and these lessen the rather heavy style of the Trebbiano, which provides body for a white wine. Yet there are other Umbrian wines than Orvieto, and en route from the charming town of that name, standing on a bluff dominated by one of the most magnificent of Italian cathedrals, one encounters another Denominazione di Origine Controllata (DOC) wine—Cilli del Trasmene—produced on the hills by the broad, shallow lake, which was the scene of Hannibal's rout of the Romans.

The DOC covers both red and white wines, and the main producers are the co-operative of Castiglione del Lago on the west side and Lambrghini, better known for premier-cru motor-cars, on the south side. The co-operative vine I found typical of many such in northern and central Italy. The co-operative was only formed in 1957 and received its DOC in

roughly in the proportion of 3 to 1, and after the must has been refrigerated the fermentation is long and slow. There is, of course, no pasteurisation, and the red wines are matured in oak, which gives perfume and taste to the rinfresco wines. I found the 74 and 73 excellent. I hope to say more about Dr. Lungarotti's wines in another article, as he is a great experimenter, and has Cabernet, Sauvignon, Goltztraminer and Pinot Chardonnay in his vineyards, which can only be sold as table wine, as these are not yet authorised varieties. For those in the neighbourhood I should mention the wine museum in Torgiano formed and designed by Dr. Lungarotti as designed by him. I have visited quite a few wine museums, and most are devoted to the implements of wine making and its containers throughout the ages. So partly is the Museo del Vino at Torgiano, including an immense ancient press operated by a huge beam, and used in Gubbio until as recently as 1970, but there is also a splendid collection of works of art and literature associated with wine; the finest I have seen outside the one, entirely given over to works of art, at Mouton-Rothschild, by which, Signora Lungarotti declares, she was greatly inspired. The arrangement and lighting have been most attractively conceived. It is worth the detour.

Tote plans for Cheltenham

WITH NEARLY a month of the Flat season to go, few people are thinking ahead as far as the festival meeting at Cheltenham next March. But the Tote is judging by what appears to be an almost complete ante-post rundown on the Cheltenham Gold Cup, which it sponsors for the first time.

RACING BY DOMINIC WIGAN

reading. Even at this stage, the introduction of a full ante-post book might see many an in-termediate booker jumping in early for odds which may soon be unavailable. Midnight Court is, as might be expected, a clear favourite at 7-1, while Gay Spartan and Gaffer are available at 10-1 and

Elton John Hurdle: Kempton last year, will be there again later this month.

The Henry Cecil-trained horses are under something of a cloud at present with the virus beginning to bite into Warren Place. I intend opposing both Poles Apart and Karliński with John Dunlop-trained entries at Brighton this afternoon. Sandhaven looks likely to beat Poles Apart in the opener, and Highland Bear, already a course winner, can take advantage of the 4 lbs he receives from Karliński in the nursery.

BRIGHTON 1.15—Sandhaven 5-1 2.15—Sea Master 7-1 2.45—Highland Bear 7-1 3.15—Mazawa 7-1 3.45—Topsis 7-1 4.15—Sweet Fellow

TV Radio

BBC 1 ↑ Indicates programme in black and white. 6.40-7.55 am Open University (Ultra High Frequency only). 9.35 For Schools, Colleges, 12.45 pm News, 1.00 Pebble Mill at One, 1.45 Bargain, 2.00 You and Me, 2.14 For Schools, Colleges, 2.30 Pab Yn Ei Fro, 2.53 Regional News for England (except London), 3.55 Play School, 4.20 Secret Squirrel, 4.25 Jackanory 3000, 4.40 Buford Files and Dinky Dot, 5.00 John Craven's Newsround, 5.10 Stop-

6.30 Reporting Scotland, 6.45-7.15 Rolf Harris's Cartoon Time (as London and South East), 10.20 Current Account, 10.35 Write Away, 11.10-11.40 Mainstream, 12.10 am News and Weather for Scotland. Wales—10.35-10.58 am I Yspgolau, 4.40 Crystal Tipps and Alistair, 4.45-5.00 Pier Masgett, 5.55-6.20 Wales Today, 6.45 Heddiw, 7.10 Trefnyd Pridodas, 7.40-8.30 Bonanza, 12.10 am News and Weather for Wales. Northern Ireland—3.53-3.55 pm Northern Ireland News, 5.55-6.20 Scene Around Six, 6.45-7.15 Hello Sunshine, 12.10 am News and Weather for Northern Ireland. England—5.55-6.20 pm Look East (Norwich); Look North (Leeds, Manchester, Newcastle); Midlands Today (Birmingham); Points West (Bristol); Today Today (Southampton); Spotlight South West (Plymouth), 6.45-7.15 East (Norwich) Woman to Woman; Midlands (Birmingham) Know Your Place; North (Leeds) Hometown; North East (Newcastle) Funny You Should Say That; North West (Manchester) Sit Thru Deann; South (Southampton) Out To Win; South West (Plymouth) Zodiac and Co.; West (Bristol) The Rectangular Picture Machine.

F.T. CROSSWORD PUZZLE No. 4,094

Grid for crossword puzzle with numbers 1 through 28.

ACROSS 1 Stops fighting present wrong (5, 3) 2 (Quite a lot join well-behaved minority (4, 3) 3 Drooping youth leader growing tall (5) 4 Plunder and sack with a fistful (5, 4) 5 Shorten the time I pose about (9) 6 Leave skill without slang (5) 7 Look over the West-end? Not much (6) 8 Rage as company gets north-east gale warning (5, 4) 9 Request to master delights inland revenue (6, 3) 10 Doctor for example's found in the grounds (5) 11 Union of students returning to the top when day begins (13, 2) 12 Feather to put on near the foothills (4, 5) 13 Upper Vith boy is playing very well (2, 3, 4) 14 With ineptitude shows yours to be old-fashioned (5) 15 Soldier who is nothing special (7) 16 Figure without any horse attached (7) DOWN 1 Printer's craft (7) 2 Fan opening one in the small hours (9) 3 Authority to speak like a (3, 2)

CHANNEL Channel is the only IBA company transmitting programmes during the present industrial dispute. Details of this local service are given below. 7.00 pm News, Weather etc. 5.00 Puffin's Birthday Greetings, 5.05 Fan Face, 5.30 Documentary, 'Once Upon a Circus', 6.00 Report on 'The Circus', 6.30 News, 7.30 Then Came Crusoe, 8.30 TV Movie, 'And No-one Could Save Her', 9.50 News Headlines, 9.55 Ret., 10.50 French News.

Radio Wavelengths: BBC Radio London: 1 1083kHz/255m, 1080kHz/237m 2 883kHz/435m, 880kHz/417m 3 1215kHz/267m, 1210kHz/249m 4 200kHz/1500m, 195kHz/1320m

RADIO 1 (a) Stereophonic broadcast 7 Medium wave 5.00 am As Radio 2, 8.00 Dave Lee Travis, 9.00 Peter Powell, 11.31 Paul Brunton, 2.00 pm Andy Powell, 4.31 Kid Jensen, 5.00 News, 5.30 Mike Reid, 5.30 Newsbeat, 7.00 John Peel (12.00-5.00 am As Radio 2).

RADIO 3 6.55 am Weather, 7.00 News, 7.05 Overlook concert, part I (5), 8.00 News, 8.05 Concert, part I, 8.00 News, 'This Week's Composer: Prokofiev' (5), 10.00 Aldburgh Festival 1978 (5), 11.30 Mozart and Mendelssohn Quartet (5), 12.10 pm in Short (talk), 12.30 Flanagan Festival, part I (5), 1.00 News, 1.35 St. Constantine, 1.50 Flanagan Festival, part I (5), 2.25 The Polynesian Salon (5), 3.10 Unaccompanied Bach (5), 3.45 Andrea Schif (piano), 4.55 Concert, part I (5), 5.00 News, 5.10 Interval Reading, 5.30 Concert, part I, 5.15 Music and Message, 10.00 Mozart and Mendelssohn Quartet (5), 11.00 News, 11.55 News, 11.55 News, 11.55 News, 11.55 News.

ENTERTAINMENT GUIDE

OPERA & BALLET COLISEUM. Credit Cards 240 5258. ENGLAND NATIONAL OPERA. Tonight & Fri. 7.30: Falstaff. Tomorrow: Concorde. 10.45 balcony seats avail. on day of performance. COVENT GARDEN. CC 240 1066. (Carriage and credit cards 235 9303). Seals and tickets for 'Tommy' 7.30. 'The Barber of Seville' 7.30. 'Rigoletto' 7.30. 'The Tales of Hoffmann' 7.30. 'The Marriage of Figaro' 7.30. 'The Tales of Hoffmann' 7.30. 'The Marriage of Figaro' 7.30. 'The Tales of Hoffmann' 7.30. 'The Marriage of Figaro' 7.30.

WHERE DO TOP BANKERS MEET EACH MONTH? THE BANKER

THE independence of central banks. * Lessons from sterling's dirty floating. * Issues behind the US-German bid for Euro-market controls. * The tangled web of US banking legislation. * Keynes re-interpreted on inflation. * The role of financial futures. * Why Hong Kong bank profits are up. * The Fed plans in to exchange rate talks. * How much capital banks should have.

THEATRES

DUCHES. 01-336 3725. Mon 10 Thurs. 8.00. 5.00. 2.00. 1.00. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA.

THEATRES

THEATRE NATIONAL. 01-336 3725. Mon 10 Thurs. 8.00. 5.00. 2.00. 1.00. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA. THE NIGHT CALIFORNIA.

THE ARTS

Museum of Modern Art, Oxford

Kandinsky: mysticism and delight by DAVID PIPER

There has been, in Britain, a gradual acceptance, by an audience wider than that of specialists, of the proposition that German painting of the first half of the twentieth century is to be taken no less seriously than the output of Paris. This has, however, depended on the actual work becoming known mainly either in reproduction in the flood of popular art-historical works or in rare loan exhibitions. German painting is still thinly represented in The Tate; in the provinces, the opportunity of becoming familiar with German work in local museums is still almost non-existent. In contrast, the Guggenheim in New York has had a surfeit of Kandinskys that they felt they must sell some. In the history of modern painting, Kandinsky is a name for any cultured person to conjure with, but far less frequently is it a signal that any Britisher dropping in is acquainted at first hand with the depth and range of his work. Any Kandinsky exhibition on these shores must therefore be welcome.

The selection that has now travelled to the Museum of Modern Art at Oxford (until 28 October closed Mondays) from the Edinburgh Festival showing comes entirely from the Lenbachhaus in Munich, and thus from the unique collection that Gabriele Münter gave in 1957. Her long association with Kandinsky broke when he had to move back to his native Russia from Munich after the outbreak of war in 1914. It was not resumed, but she retained a unique accumulation of his work up to that date. The exhibition is therefore limited to Kandinsky's Munich years 1906-1914. In Oxford, the Museum has made a highly commendable attempt to set it in a wider context with a slide show, with commentary by Christian Newton, that illustrates the whole work of that remarkable

man — proceeding on from Munich to his active involvement with art in revolutionary Russia; his subsequent career at the Bauhaus, and his final years in Paris until his death in 1944. Gabriele Münter's collection consists mainly of small-scale works — drawings and watercolours, etchings, more than oils. Thus there are some nine studies, including one small oil, for one of the major masterpieces of the period, Composition No. 7 of 1915. These demonstrate excellently the complex process of experiment and evolution that preceded the apparent spontaneity of the finished work — and also demonstrate, as does the whole exhibition, how ill the subtleties and incandescence of colour, the vitality of line, in the originals is served by even the best techniques of colour reproduction. The studies include one rough schematic pencilling of the whole composition, but even so their full significance cannot be grasped in the (inevitable) lack of the final painting (Tretyakov Museum, Moscow); it is almost 10 feet across.

For the catalogue, Peter Vergo contributes a useful introduction, against which I have only one minor crib, about his adherence to the fashionable doubts about the authenticity of Kandinsky's famous coup de foudre, his conversion to abstract painting. It seems a bit crabby to deny this to Kandinsky, who after all recorded it himself. Mr Vergo alludes to it, but suggests a pinch of salt. And yet — it was the hour of approaching dusk [The painter is returning to his studio] still dreaming and wrapped up in the work I had completed when suddenly I saw an indescribably beautiful picture drenched with an inner glowing. At first I hesitated, then I rushed towards this mysterious picture of which I saw nothing but forms and

colours, and whose content was incomprehensible. . . . It was a picture I had painted, leaning against the wall, standing on its side. This can be explained in part as being the so-called "Purkinje effect" (a mutation of quality of certain colours perceived by the eye, briefly as daylight fades), or wholly as romantic nonsense. In fact, Kandinsky's gradual movement into abstraction can be demonstrated — not only from the intrinsic evidence of his painting from at least 1905 on, but from his writing (On the Spiritual in Art, published 1911, was in progress from 1889 on) and the witness of contemporaries, while the question, sometimes angrily debated, whether he was literally the first in the abstract field (surely not) is idle. St. Paul, before hitting the road to Damascus, surely had been moving, and doubtless consciously no less than subconsciously, towards Christ, but to doubt the clinching revelation in the blinding flash is unnecessary and life-depriving.

Mr Vergo comments that the innocent visitor may well assume at first that the exhibition is showing the work of two different artists, and the contrast between the early figurative work and the later abstraction is indeed startling. The earlier work, at times almost anonymously, in the Jugendstil tradition, the version of that style international by the end of the nineteenth century, finding its most characteristic medium in the woodblock. The Russian flavour though can be strong in Kandinsky's particular vision of Russian folklore, mysterious princesses, knights on horseback (sometimes as if by a rustic Slav Frank Brangwyn). However again and again in the swift drawings, the essential strength of Kandinsky's genius is clear. In drawings such as the



Sketch for "Picture with Houses," by Kandinsky

study for Pictures with Houses of 1908, for example, while a small oil of Houses in Moscow also of 1908, reveals its abstract scaffolding aggressively. In another earlier drawing, the soundwaves of the music of bells take shape in a swirl of sky and cloud over a low horizon of onion-topped roofs. The imagery of his first abstract manner (as distinct from the later sharply defined "hard-edge" shapes that came in the Bauhaus period) is still (for me) often more confusing than illuminating, as his favourite motifs — horsemen, angels with trumpets, etc. dissolve into unrecognisable vestiges. These forms at first seemed to most people entirely arbitrary (even as did the faceting of cubist painting originally); that they, rather than any other notations, should have established their authority as elemental signs of universal urgency, is still relatively inexplicable. That they have done so, there is no doubt, and

they are now part of the visual landscape. And at their finest, these mysterious incandescences do approach the condition of music, to delight the receptive eye, as Kandinsky hoped they would. He is still too often thought of as pedant; he was a mystic and a man of delight. A drawing here is inscribed: Drawing gives pleasure (but better in the German: Zeichnung beglückt). Roger Fry, sighting Kandinsky's work in London in 1913, exclaimed: "Pure visual music."

Although, working in the Ashmolean Museum, as I do, it would be reprehensible not to confess interest, it would be still more reprehensible not to advise a visitor to Kandinsky in Oxford also to call in at the Ashmolean to see the memorial exhibition (also till October 28) to Erwin Bossanyi, who died in 1975. Hungarian-born in 1891, he was of a younger generation (Kandinsky's "conversion" was probably, astonishingly, not

Elizabeth Hall

Dmitri Alexeev

by DAVID MURRAY

It was not an out-of-the-way programme that Mr. Alexeev offered on Sunday, but in the event he contrived many surprises and even shocks along the way. He began with Liszt's Variations on Weinen, Klagen, Sorgen, Zagen: a performance of concentrated intensity without a lapse in its baleful grip. He forced a colossal sound from his piano — not indiscriminately, but toward the top of his dynamic scale one began to fear for the instrument. Brahms came next, the op. 76 set of Capriccios and Intermezzi. Here Alexeev was all caprice. Generally the melodic line was brought out sharply, facetiously inflected, and everything else reduced to a murmuring background; sometimes instead he seized upon points remote from the main stream of the musical argument and wound the rest of the music about them. The characteristic Brahmsian textures were regularly transcribed into something stranger and more Slavic; remembering that Brahms was the heir of 19th-century Russian composers, I wondered

whether Alexeev was not re-inventing him for Eastern Europe. An intriguing reading, at the very least, highly personal and unprecedentedly volatile. Schumann's Papillons, with much less to lose in the way of inner parts or complex harmonic substance, received similar treatment, and took might very well. Though there were passages that did not deserve the redoubled if he assumed them (and one began to notice that his left hand is neither so fleet nor as accurate as his right), there was energetic imagination at work everywhere, and a dante rubato well insured by his touch rhythmic sense. Liszt's Grand Etude after Paganini were a disappointment after that, despite any amount of circus panache; they were desperately hard-driven, with the melting arabesques of the second Etude turned into little thunderbolts, and an over-par quantity of wrong notes in the spicato study. The set sounded a row left over from student show-off days — the mature Alexeev is a far more interesting artist.

Wigmore Hall

Shostakovich

by ANDREW CLEMENTS

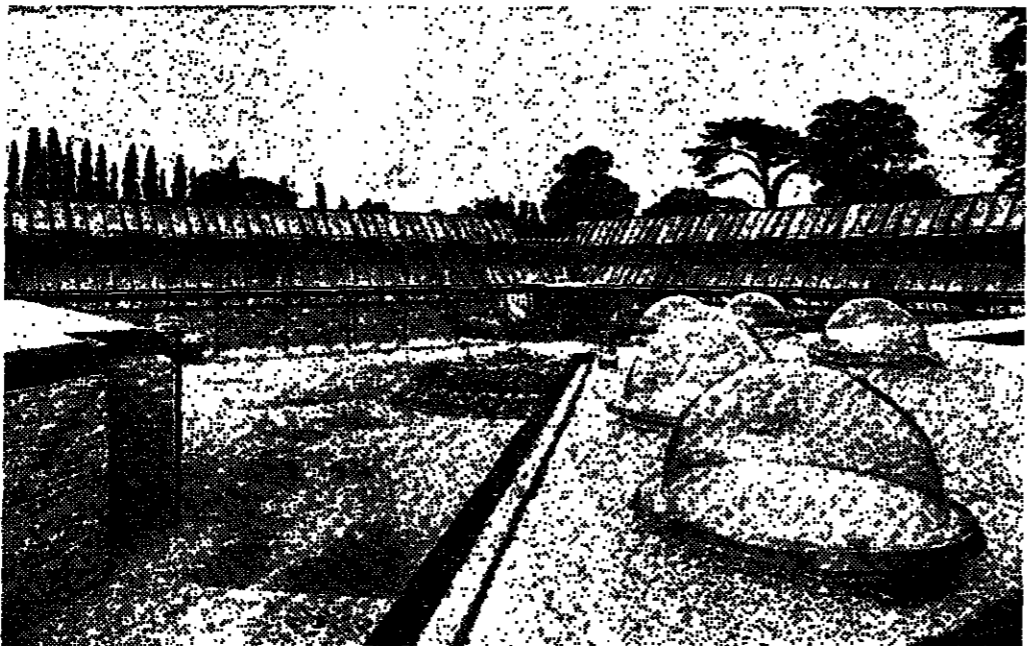
As his memoirs — soon to be published — reveal, Shostakovich for much of his life was a profoundly unhappy individual. His chamber music is often regarded as the private notebook into which he poured his most private, and hence, musical thoughts and perhaps for that reason it is more variable in quality than much of his output. The point was underlined by the selection of items in the all-Shostakovich programme given by Roger Woodward and the Edinburgh Quartet on Sunday, afternoon — second-rate music in the first half, a near masterpiece after the interval.

The first half divided between the sixth string quartet, op. 101 and the piano trio, op. 67. The string quartet is Shostakovich in his most blandly pastoral vein, the tone almost melancholic, but retaining a hint of self-satisfaction. Very little seems to happen in the Edinburgh Quartet played the work, though loathe to impose any sharp characterisation on its musical ideas and making little apparent attempt to produce a grateful sound or any cosmetic phrasing. The piano trio, too, divulges very little. Save for the

Architecture

Must all the flowers go? by COLIN AMERY

Yesterday morning the bulldozers arrived to start on their grisly task of destroying a large garden in the centre of London. The garden is growing in the middle of Covent Garden on a site in Long Acre and there is a complicated story that explains its presence there. Back in the early 1970s, when the battle for the future of the Covent Garden area was at its height, the Greater London Council reached an agreement with the owners, of what was always known as the Odhams site, that a part of the land should be offices and another part public housing. Today the brick-built, high-density public housing is under construction but the rest of the large site is largely occupied by a community garden. It is this garden that will disappear, as everyone always knew it would, as soon as the MEPC property company decide to build their office block.



Courtyard offices at Stoke House by Richard McCormac and Peter Jamieson

Everybody loves a garden. In the middle of the city a garden is especially desirable — particularly when the planting and the labour of maintenance is largely borne by the local people. But there is a proper agreement between all the parties that the office block can be built — the trouble is that the Covent Garden planners who developed over the last few years makes the presence of large lumps of offices very undesirable. Is there some alternative — some more reasonable 11th-hour scheme? I am sure there is, providing, of course, that goodwill exists between all parties and a genuine desire remains with the Covent Garden planners to give their best for the area. London needs more developers who are prepared, as they are in New York, to incorporate public uses and spaces at street level in their office schemes. This is the perfect site for an experiment. Architects have long realised that reasonably low buildings around courtyards provide as

much space as high blocks. Many studies have been made to discover alternative built forms. The Martin Centre at Cambridge has been a particularly fertile seedbed for the study and development of courtyard buildings. One architect, Richard McCormac, whose office is in Covent Garden, has built a small courtyard scheme in Buckinghamshire and has prepared a study for an energy saving courtyard office scheme for the Covent Garden area. Richard McCormac and Peter Jamieson are one of the most interesting, small, younger practices in the country. They have a record of building a number of rather low-key housing projects at Duffryn, Milton Keynes and Blackheath.

The courtyard office scheme at Stoke House in Buckinghamshire, apart from being an agreeable cloister arrangement of rooms with garden views, has

lessons that could well be applied in an urban context, and at a larger scale. In the city the court could easily be a roofed space that sheltered the public activities or a garden or a combination of public and private uses. In Richard McCormac's theoretical scheme for half a hectare of courtyard buildings in Covent Garden he demonstrates that the roofed court plan can save energy and provide a range of offices that satisfy commercial plot ratio considerations. At Stoke House the reality of a most attractive working environment clearly shows the advantages of the flexible geometry of the quadrangle idea.

How do Stoke Poges and Covent Garden relate to each other? The answer is clear. The offices in the country show the advantages of experiment. Covent Garden should be a nursery of new ideas for the city.

The scheme that has been prepared for the MEPC site by the architect Richard Seifert is lumpenly predictable. There is no sign that the architect or the planners are showing any imaginative concern for the fabric at the heart of London or for the fragile sense of community that still exists in Covent Garden. The "garden" site offers a rare and perfect opportunity for an architectural improvement to the urban scene that could please everybody. Too much post-war building in London looks as though it has been designed by an inept computer. It would be tragic if the gentlemen's agreement that let the flowers bloom again in Covent Garden were in the end responsible for more architectural blight. Inigo Jones's patron wasn't scared to give Covent Garden, the Piazza. Why are today's property moguls so timid?

Coliseum

A ballet gala plus

by CLEMENT CRISP

Dancers are very generous with those precious commodities of time and energy in the cause of charity, as we know from how many galas there are in aid of good causes. On Sunday night, the cause was the City of Westminster Society for Mentally Handicapped Children, and Marguerite Porter and Wayne Eagling as organisers, with their many friends, deserve every praise for raising £25,000; anyone unable to attend, and wishing to help, may care to know that the Society's office is at Room 19, Westminster Council, House, Marylebone Road, London NW1. The gala included some non-dance material: Benjamin Luxon and Robert Tear in two Victorian duets; the gymnast Susan Cheesborough, with Wayne Sleep's Olga Krubut as an attendant sprite; the magician Simon Drake; the pop singer Freddie Mercury with members of the Royal Ballet; and the exceptional mime Nola Roe, madly affronted by a tiny violin. Dancers from London Festival Ballet appeared in part of Etudes, and Ballet Rambert gave the first movement from Christopher Bruce's new Sidewalk, set to the Lambert concerto for piano and nine instruments. But the evening was effectively dominated by a cohort of fine male dancers. In Robert North's Troy Game, the stalwarts of London Contemporary Dance Theatre — North, Anthony van Laast, Michael Small, Patrick Harding Imer and Christopher Bannerman — were joined by Eagling, Stephen Jefferies, Graham Fletcher and Wayne Sleep, in a tremendous and happy display of prowess. Fernando Bujones partnered Jennifer Penney in the third act duet from Sleeping Beauty, and produced dancing of true classic ease; Peter Schaufuss

was a bemused strong-man involved with Lesley Collier's pouring equestrienne in Kenneth MacMillan's Side Show, falling signally to disperse his magnificent schooling under the catagogue services when it came to windows — yet another failure of British patronage. Anthony Dowell danced, radiant, in the fragment from Gluck's Orpheus which Ashton made for him a couple of years ago, an exercise in which serenity is suggested through choreography that insists upon strange, swift sinuosities as well as an air of celestial calm. From Los Angeles, John Clifford appeared as a dancer in the Balanchine Chaconnes pas de deux with Joanna Kirkland, and as choreographer for Un Sospiro, a duet especially made for Marguerite Porter and Mark Silver, who yearned in white costumes while the pianist Phillip Gammon produced a beautifully poised account of the Liszt study. Merle Park and Wayne Eagling gave an ideal performance — sensitive, innocently eager in sensuality — of the bedroom pas de deux from Menon; an Monica Mason and Michael Coleman were seen in the waltz duet from Dances at a Gathering. The evening also brought the first London visit from Patrick Dupond, youngest star of the Paris Opéra Ballet. Dupond is very gifted, possessing a bright technique and a stage presence at once youthful-outgoing and mysterious — he is in a great advantage as the Messenger in Song of the Earth at the Opéra. His impersonation of the child Pan at this gala transcended some dangerously cute moments in the solo Le Petit Pan made for him by Norbert Schupick to Grieg music, and the force of his personality, as well as the liveness of his style, were most admirable. The evening was, in sum, a tribute to the abilities as well as the generosity of its artists. And quite in character its remembrance of the late and much lamented Sydney Edwards of the Evening Standard, whose own great kindness and generosity of spirit made him loved by everyone in the theatre.

The Diary of Lord Dalton, which he kept through much of his career spanning the period 1916 to 1969, is to be edited for publication. The papers are held by the British Library of Political and Economic Science at LSE, which also owns the copyright. It is proposed to publish two volumes of about 250,000 words each, or about one-quarter of the original. The Leverhulme Trust is making a grant of £34,000 to the school for the task. Dr. Ben Pimlott, formerly a lecturer in politics at the University of Newcastle, author of Labour and the Left in the 1930s (Cambridge 1977), has been appointed as a visiting research associate at the school from October 1979, for two years to work as editor.

Hugh Dalton's diary

MICROS Britain's Future? What are the technological, industrial, and social implications of the micro-processor? What is Britain's role in the micro age? How can industry adjust to the inevitable change? How can management recognise the potential and meet the challenge? These are some of the questions which will be explored at a major one-day seminar for senior management under the title Micro-electronics — Assuring the Future for Britain. Speakers: The Viscount Trenchard MC, Minister of State for industry; Keppel M. Simpson, BEng, CEng, IEE, FIMC, Director of Corporate Development, PA International; Michael James, CEng, FIEE, MIM, Director and General Manager, Rank Taylor Hobson and Rank Oakes; Professor R. J. Ball, MA, PhD, Principal of the London Business School; David Finberg, FECS, AMBIM, Director of the National Computing Centre. The seminar Micro-electronics — Assuring the Future for Britain will be held at the Grosvenor Hotel, London WC2, on Wednesday 14 November, 1979. Cost £126.50 (NCC members £113.25). For details and to reserve places please contact Joan Sedgwick, The National Computing Centre, Oxford Road, Manchester M1 7ED. Tel: 061-238 6333. NCC

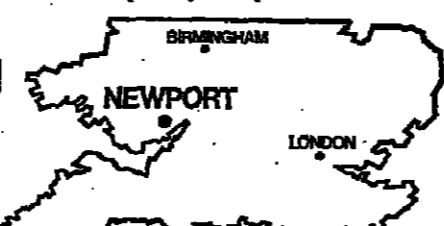
Get fromable

Work it out. The vital part of your communication with the rest of the world is the distance from 'goods outward' to the transport networks. Look at Newport. No site in Newport is more than 10 minutes from motorway, railhead (125 to Paddington) or docks. The airport is 30 minutes down the road. We've industrial sites large and small for immediate development.

Our labour relations are excellent. Many household names are already profitably based here. Backed by the sort of Local Authority support and Central Government financing you'd expect. Enjoying the living environment that you wouldn't. For full details — fast — contact Steve Wehrle (Dept. F.T.) The Civic Centre, Newport, Gwent. Telephone Newport (0633) 65491.

NEWPORT

The 10 minutes from anywhere town.



"The most beautiful hotel in New York." That's what visitors from abroad say about the Pierre. For the best of reasons. It's the one hotel grand with Old World touches. Sweeping murals. Elegant decor. Airy suites. Service that pampers. And architecture that meets the sky where Fifth Avenue joins the park. The Pierre. It's a rare beauty. And the world never has enough of that. For reservations and information in the U.K., call London, 01-567-3444. Henri Mennessier Vice President & General Manager The Pierre FIFTH AVENUE AT 61ST STREET NEW YORK, N.Y. 10022 MANAGED BY TRIST HOUSES FORTE, LTD. Member Preferred Hotels Association

FINANCIAL TIMES

BRACKEN HOUSE, CANNON STREET, LONDON EC4A 3DF
Telegrams: Finantime, London FSA. Telex: 395457L, 863897
Telephone: 01-248 8000

Tuesday October 9 1979

A rally is not enough

THE CONSERVATIVE Party Conference this year comes last in order, but first in importance. The conference which opens in Brighton today will have many of the appearances of a victory rally, and understandably so. It is the first time that the party faithful have met en masse since the general election in May: clearly they feel that they have much to celebrate. They would be also less than human if they failed to draw attention to the relative shambles in Brighton last week. Not so long ago, Labour had a claim to being the natural party of government. It did not look like that in Brighton.

Unions

Conservatives will be judged, however, not so much by the quality of their victory celebrations as by how they shape up to the future. By any standards the problems facing the Conservative Government are formidable. The Liberal Party Assembly at Margate two weeks ago, in however inept a fashion, at least drew attention to the question mark over economic growth, not so much as a statistical trend but as a political phenomenon. What is to be the political reaction if growth comes more or less to a standstill?

In its own roundabout way the Labour Conference also made a contribution to the inchoate national debate. The message that emerged from Brighton was that of trade union power. The unions may be divided and they may be uncertain how to use the power they have, but the power undoubtedly exists. Any British Government is going to be in difficulties if union power cannot be either harnessed or neutralised.

It was problems with the unions which at least contributed to the failure of the last three governments to be re-elected. The Wilson Government of 1966-70 sought to reform the unions through "In Place of Strife," but was seen to capitulate before union opposition. Mr. Heath fell to the miners, and Mr. Callaghan to the discontent last winter. Conservatives ought also to reflect on the increasingly fickle nature of the British electorate. One Government after another has been turned out before it had completed whatever it was trying to do,

and the anti-Government swings in both by-elections and opinion polls have been even more striking. While it is true that the present Government ought to be by-election proof for a full-time Parliament, no Government takes easily to a sustained upsurge of unpopularity and few have kept their nerve when that has happened: witness, for example, the convulsions under the Macmillan administrations, let alone the about-turn under Mr. Edward Heath.

Liberals

There is a tendency among Conservatives to say that this time it will be different. That is an understandable sentiment for a party convinced of its cause and with an election victory recently behind it. Yet there are also wider considerations. The Conservative victory, though decisive in Parliamentary terms, was unevenly spread across the country. The Liberal Party, supposedly in decline and disarray, still took nearly 14 per cent of the votes, while the Labour Party, which has practically always been in disarray, quickly returned to the lead in the opinion polls.

The Conservatives need to look back not only at the last election results, but also at the reasons why there have been so many political upheavals. Few other comparable countries have chosen to change their political allegiance so often. France and West Germany, for example, have had broadly unchanged governments for almost the last decade. It cannot be that the British electorate is simply reacting to an excess of socialism or an excess of Toryism, for both major parties have been thrown out in their turn within the last few years. It is a matter rather of governments failing to command the confidence of the country, once elected.

Wider appeal

That is the question to which Mrs. Thatcher must now turn. There is nothing wrong with a victory rally, provided it is kept in bounds. Yet the Conservatives' stay in office will depend not on the party faithful, but on widening their appeal to those who did not vote Conservative last time, or if they did, did so only on trust.

A setback for Mr. Ohira

WHEN Mr. Masayoshi Ohira, Japan's Prime Minister, called elections a year earlier than necessary, he knew the country had a difficult winter ahead. The electoral upset this weekend for his ruling Liberal Democratic Party can only add to those difficulties.

Unstable

The "stable majority" widely predicted for his ruling Liberal Democratic Party was expected to dispense more easily the unpleasant medicine that these difficulties are expected to require. The eventual result, which left the Liberal Democrats nine seats short of an overall majority in the Diet (Lower House), and 13 seats short of the "stable majority" sought by Mr. Ohira, solves none of the Government's problems. Mr. Ohira will continue to depend on the support of 10 independents in the Diet, and has failed to win control of the crucial Budget Committee.

The Japanese Prime Minister had numerous incentives to hold elections now rather than wait into 1980. First, and most important in electoral terms, the country faces deepening energy problems in the months ahead. Japan is completely dependent on imported energy, with oil much the largest component. Rising oil prices, and the lack of guaranteed supplies, mean that shortages can be expected during the winter. Stocks have already been run down, and controls on consumption will probably have to be introduced. It is widely believed that the Government has kept deliberately quiet about the country's energy problems ahead of the election.

Inflation

A second deepening problem is that of inflation. The year-on-year increase in consumer prices at the end of August was three per cent. But this is expected to rise to five per cent by the end of the fiscal year. Wholesale prices are advancing at twice this rate. An anti-inflationary package is thought to be inevitable. The price of heating fuels can be expected to rise rapidly in the winter

ahead. The Prime Minister hoped that a clear electoral majority giving him control of the Budget Committee, would enable him to introduce measures to reduce government deficits and tighten credit are now in doubt.

In Party terms, Mr. Ohira expected that a big success at the weekend would bolster the Liberal Democrats' prospects in elections next July for the Upper House. The party has a water-thin majority of one seat there at present. He also hoped success would secure his position as Party Leader when leadership elections are held at the end of 1980. In both respects, Mr. Ohira's hopes have been dashed. Calls for Mr. Ohira's resignation are unlikely to come to much, since there is no obvious successor at the moment. But the election has done nothing to enhance his position in his faction-ridden party.

Mystified

Mr. Ohira confesses he is "mystified" by the result. His one comfort must be that he is certainly not the only one. No one has predicted a reversal for his party, and for the third time in four elections the Japanese media got it wrong. The implications of the result for the outside world are difficult to predict. Both the Tokyo stock market and the foreign exchange market took the election result calmly. In foreign affairs, Japan's role in the eastern Pacific is unlikely to change. A big swing to the Liberal Democrats might have resulted in a more active Japanese defence role in the region. But the fact remains that when one talks of change in Japan's defence role, one is only talking about changes in the shade of grey.

Mr. Ohira gambled this election would solve some of his political problems. In the event, it has answered none, and dealt a heavy psychological blow to his party. It has lived with a coalition for the past three years, however, and as the tantalising prospect of a clear majority fades, it will learn to live with a coalition in the future.

Mr. Volcker sets a monetary ambush for U.S. markets

BY ANTHONY HARRIS

ACCORDING to fashionable economic theory, markets are well-informed and always fully discount what is known of official policy. It follows that only unexpected action by the authorities has any effect on the real world.

On the test of "rational expectations," Mr. Paul Volcker has administered the most effective shock to the U.S. economy since the original OPEC price increase of 1973.

However, the much-publicised 1 per cent rise in the official discount rate is only a very minor part of that shock, for some quite sharp further rise in rates was generally expected in response to recent U.S. money supply data.

It is the fundamental change in the Fed's approach to the dollar problem and to U.S. monetary management, which takes the U.S. into financial waters which are as yet uncharted in New York (though familiar in London) which will deliver the shock. The economy will respond, as the currency markets already have responded.

Fundamentally, Mr. Volcker has made three basic changes in U.S. policy. Most sweepingly, he has acknowledged that the cause of a weak dollar and a weak balance of payments must be sought at home; the remedy must be effective control of domestic credit growth, rather than in measures to support the dollar in the currency markets.

British lesson

This is the lesson which Britain had to learn from the IMF in 1967 and again in 1976. It is so new to American perceptions that it still has to find a banker in New York who knows the initials DCE—the familiar London shorthand for domestic credit expansion.

The commercial side of the money market still has a whole world to learn.

The second change follows from the first: the Fed has now acknowledged that offshore flows of dollar credit have just the same effect on the U.S. economy as those created in U.S. domestic banks, and the new reserve regulations apply to U.S. banks business with U.S. customers globally, not just domestically. The details are still unclear, but the domestic effect is simple: an enormous loophole has been closed.

Finally, and most radically of all, the Fed has made a change in its market management system almost as fundamental as was the British revolution ushered in by Competition and Control, the historic Bank of England circular of 1971. The Fed no longer has an interest rate policy. This means no target for the Fed Funds rate—the U.S. interbank rate; instead, there will be a target for the growth of bank reserves, and the interest rate will emerge from the market.

Since the Fed has always concentrated its own open market operations in the money market, as opposed to the Bank of England's basic preoccupation with long-term funding in the gilt market, this is a change as radical as the Bank's decision to cease supporting prices and stabilising interest rates in gilts eight years ago. The New York money market has seen its most familiar signpost demolished.

These changes add up to an event in monetary policy of the first magnitude. The extent of the shock can be judged by comparing the Fed's actions with the comments of one of its most persistent critics, the *Bank Credit Analyst*, circulated only a few days before Mr. Volcker's announcement.

"Institutions, like individuals, reap what they sow,"

said this Canadian Jeremiah. "The Federal Reserve's performance, particularly since 1977, will go down in the annals as one of the darker periods. Persistent excess monetary growth created dramatic inflation, (but) the weakness of the economy brought forth ever greater efforts by the Fed to expand the money supply."

Now that the man responsible has been rewarded for his efforts by promotion to Secretary of the Treasury, and a new chairman, Paul Volcker, is in charge, the question has arisen whether a basic change in policy is now evolving.

Reluctant rise

Credit demands continue to explode and show no signs of abating yet. With the Fed still supplying ample bank reserves, the money supply cannot do anything other than rise excessively. The Fed is continuing to support expectations of inflation. . . . Our guess is that the Fed will continue to drag its feet, hoping something good will happen. . . .

This, of course, points to the continued reluctant upward creep of interest rates which has persisted for 18 months, and was widely predicted on Wall Street by many authorities.

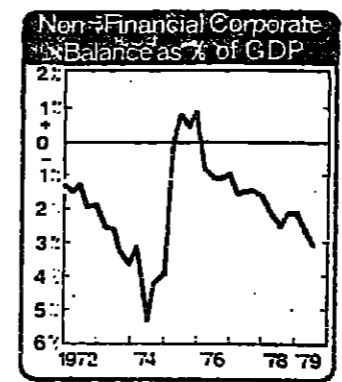
This quotation also illustrates not only the widespread distrust of the Carter administration, which it was generally felt would block any radical policy change, but also the shaky perception in Wall Street of the link between the credit markets and the foreign performance of the dollar. Much of the explosive credit growth of recent weeks has gone to finance speculation against the dollar, and has wound up not as an addition to the U.S. money supply, but as additional dollar reserves held



Mr. Paul Volcker (left), driving home the lessons Britain had to learn in 1976; Mr. William Miller, U.S. Treasury Secretary, said yesterday to be worried about the political implications of some of the new measures.

by the Bundesbank and other active interveners in the market.

However, the basic point is directed straight to what Mr. Volcker has done: expanded lending requires a base of expanded bank reserves, and can only be stopped if the Fed refuses to supply those reserves. That is precisely the meaning of its new open market policy, and of the reserve requirements now imposed on U.S. banks trying to



finance higher lending in the wholesale money markets or the Euromarkets.

The main chart illustrates the Bank Credit Analyst's strictures, and the fundamental importance of the new policies. Excessive monetary growth as measured by the M1 and M2 series which have been the traditional measures of U.S. monetary policy has been fitful; the squeeze imposed as part of the November 1 package last year put apparent monetary growth into reverse for a time, at least on the narrower measure.

But the growth of base money—a still narrower measure, now known in this country as M₀—was only modestly reduced. The banks were finding ways to finance their lending book outside the money supply. It is base money which the Fed directly controls. The change therefore looks at first sight like a change from permissiveness to an outright credit crunch, at any rate to British eyes, which are used to fixed reserve ratios for the whole bank book. The idea of base money

control is increasingly popular in the City, but the Bank of England has described it as too rigid for practical use. However, the American scene is different, and the system contains a number of built-in cushions to absorb the shock of a direct attack by the Fed on the basic trading assets of the banking system.

First, the Fed imposes different reserve requirements on different kinds of deposit: for example, reserve requirements on large certificates of deposit range from 1 per cent to 6 per cent according to maturity, apart from the new additional 5 per cent requirement for increases in wholesale money above present levels.

This means that U.S. banks can continue on reserves by persuading their customers to switch from highly liquid to longer deposits, and perhaps—as in London under the "corset"—to disintermediate, and lend directly to borrowers through the flourishing corporate paper market. (The shock of the Chrysler crisis in this market has in fact been having the reverse effect, and pushing corporate borrowers into the banks because investors had lost their appetite for corporate paper.)

In addition, borrowers can turn to the growing number of outside small banks which are outside the Federal Reserve system—and more banks leave the system every day. This combination of fringe credit and maturity swaps should give the market the flexibility to meet the Fed's requirements without disruption, as Mr. Volcker has explicitly suggested.

Fed's new puritanism

All the same the new measures are likely to have a sharp impact on interest rates. Even if speculation against the dollar in currency and gold markets is now stilled, and consumers are more readily discouraged by the Fed's new Puritanism (and consequent doubts about their future

incomes) than they have been by the rise in tax-deductible interest charges, one source of credit demand is still growing. The U.S. corporate sector is in trouble.

The sharp rise in the corporate sector financial deficit is well below the crisis levels of 1974 (in this respect UK companies are probably worse off), but high by any other standards, and still growing. This is a normal feature of any economic downturn, aggravated in this cycle by the long delay before capital investment responded to the growth of U.S. consumption. The late investment boom is tending to spill over into the economic recession; an un cushioned crunch could cause severe business problems.

Effect on others

With the cushioning available in the system, there is still a high risk of a sharp worsening of the immediate recessionary outlook, as companies try to fund their debts (bond yields have already jumped in anticipation) and cut their spending. The question for the outside world is how far these domestic U.S. events will affect activity and credit in other countries.

Forecasting at this stage, before detailed Fed policy is known and the adaptive power of the New York market has been tested, is clearly impossible; but it seems probable that except in the very short run the threat to activity, via U.S. import demand, is more serious than the threat to interest rates.

If the attack on U.S. credit expansion (the source of finance for the U.S. current account deficit as well as for currency speculation) proves strong enough to consolidate the dollar recovery seen yesterday, the peak of interest rates may be brief, as happened after the British sterling crisis of 1976; but recovery of the real economy is bound to take longer.

MEN AND MATTERS

Industrial uplift from Mentmore?

The new owners of Mentmore Towers, the followers of the Maharishi, have a scheme for raising troubled British companies off the ground. I gather they have been asking around in the City for suitable concerns, with a maximum value of £5m and labour-intensive methods.

There is one stipulation. The workforce must be willing to spend two hours a day (broken up into half-hour spells, rather like tea-breaks) in "rest and recreation"; the phrase is a euphemism for transcendental meditation (TM).

Sect members in France are one leap ahead. They have offered to take over Impermeables Saptex, a bankrupt raincoat factory in Brittany with 500 workers, for a nominal one franc, pay off the debts and invest FF 3m. But once more, there is the stipulation.

The Maharishi has said: "All this depends on approval by the French authorities, a welcome from the mayor of Rennes and agreement by the staff to the introduction of TM."



"The Tories will quote that as an overmanning of Socialist managing."

A spokesman at Mentmore told me yesterday: "We shall be advertising for suitable companies. We are going for those which are facing difficulties simply because they are available. It's a global plan, of course—we already own several factories in Asia."

The reaction in Brittany has been mixed. Adrien Sapiro, the company chairman, says: "I'll meditate if it will save the company." But the mayor of Rennes, Edmond Harve, is hostile. "Anyway," he says, "I don't think the company can be saved." For the moment, the workers are saying nothing.

In Britain, trade unionists have already been consulted about the general TM aim. "They tell us to get a factory first, then come back," says Peter Warburton, who announces himself as Mentmore's minister of information and enlightenment. What will meditation do for the workers? Warburton replies confidently: "They won't feel so tired."

Very sinister

There are now pressure groups for almost every imaginable element in Western life, so it is scarcely surprising that left-handers are waving their fists in protest. In the U.S. there is a thriving body called Left-handers International, which publishes a magazine, has proclaimed a Bill of Rights (as opposed to a Bill of Rights) and calls upon manufacturers to take left-handers more into account.

The organisation's magazine, *Lefty*, starts at the "back" by right-handed ideas, and contains advertisements for left-handed wristwatches, scissors, tin-openers and playing cards. At a convention in Kansas City, the slogan was "Left-On!" and left-handed celebrities were urged to "come out."

Alexander the Great, Queen Victoria and Leonardo da Vinci are among the heroes of Left-handers International (which claims 10 per cent of its 8,000

membership in Britain). It has to be reported, however, that the convention named Gerald Ford for its "golden hand award" of 1979.

Sinning taxman

Raizo Matsuno, the former Japanese Defence Agency chief accused of various exotic sales practices in the aircraft scandal, did not impress the voters as a man without sin. "There is no-one without sin." He was not elected, although in a sense he had a point.

The image of a hardworking and, above all, honest bureaucracy in Japan has been thoroughly tarnished in recent weeks by a series of revelations about fiddled expenses and similar corruption. Irregularities were shown to have occurred everywhere from the lowly national health insurance sections of Tokyo ward offices to the lofty height of the Finance Ministry.

The increasingly lurid revelations did not help Prime Minister Ohira, for whom the election was a disaster. A pre-election day suggestion that tax agency officials were padding their salaries with payments for imaginary overtime was particularly damaging—he spent a large part of the campaign warning of the need for a tax increase next year.

Wild cats

Attention is being focused on what in some quarters is regarded as the truly tragic aspect of economic decline. I refer to the plight of factory cats, many of which have suddenly found themselves left literally out in the cold.

In Sheffield a woman employee of one of the steel firms, aroused by the decline of the industry, has even set up a charity called "Cats in Industry" (based, incredibly, in a street called Tom Lane),

devoted to catching cats left without visible means of support. With the aid of a grant from the RSPCA it has the animals neutered and then returned "home" or found another prowling ground.

Factories aside, the stray, or feral cat, is apparently as much part of the British way of life as of the Italian, being particularly common around hospital boiler rooms and kitchens. According to the British Small Animal Veterinary Association, there are between 500,000 and 1m of them.

While factories are still working, their ferocity is useful for keeping down vermin and indeed the Post Office pays for the upkeep of one cat per post office for this reason. But when it comes to catching them, the cats—according to the BSAVA's spokesman Mike Findlay—prove themselves "among the most dangerous fighting machines there are."

The concern of CAT and others is not merely the animals themselves, insists CAT's secretary Miss Ruth Plant, a former social worker. The cruel alternative to spaying is the shooting and poisoning of the colonies by pest control officers: "There are lots of old ladies suffering tremendous traumas when they see the wild cats rounded up and killed. They often feed them once or twice a day and know them all."

Mobile lament

Sign in the rear window of a car in Brighton: "The conference is over, but the malady lingers on."

Observer

For COMPANY INFORMATION the easy way

Ask Extel - the Experts.

- ★ Extel Cards — immediately available information on some 3,300 Quoted and 2,400 Unquoted British Companies in the well known Extel Card format.
- ★ Extel Company Fact Sheets — expands the coverage of our unquoted card service. Information on over 500 companies immediately available, others available to special order.
- ★ Companies House Searches — we offer a truly professional service at competitive prices.
- ★ Overseas Companies — information on over 1,400 companies immediately available in Extel Card format. Information on other companies is usually obtainable through our international connections.

EXTEL is the registered trade mark of The Exchange Telegraph Company Limited.

To: Extel Statistical Services Ltd., 37-45 Paul St., London, E.C.2A 4PB. Phone: 01-253 3400. Telex: 263487

I am interested in the information you supply about quoted and unquoted companies.

Name: _____
 Position: _____
 Firm, etc.: _____
 Address: _____
 Telephone: _____

FINANCIAL TIMES SURVEY

Tuesday October 9 1979

International Energy Management

October has been designated International Energy Conservation Month by the International Energy Agency. It is an essential exercise. With so much uncertainty about fuel supplies it has never been more important for consumers, at company, national and international levels, to learn the value of using fuels more wisely.

Bleak outlook for supply

By Ray Dafter
Energy Editor

AN AIR of nervousness pervades the international energy scene. For it is recognised—albeit somewhat belatedly—that the fuel supply crises that caused so much disruption in 1973-74 and again earlier this year could return at any time. Even the prospect of an overall energy surplus next year, arising more from the dampened demand caused by the expected economic recession than from a significant boost in supplies, is being perceived with a good deal of scepticism within government and industrial circles. While it is true that fuel stock levels have been restored in preparation for the winter demand and the tightness in oil supplies has eased somewhat (partly due to Saudi Arabia maintaining its extra 1m barrels a day of output at least until the end of the year), consumers continue to face the risk of a major supplier—such as Iran—shutting down or restricting its output. The energy supply position could be turned on its head almost overnight. What is more, the major fuel

suppliers, and in particular the members of the Organisation of Petroleum Exporters (OPEC), might well decide to trim their production (compensating themselves with higher prices) to ensure that supply and demand remain evenly balanced. African and Arab oil producers have learned that they hold potentially powerful weapons that can be wielded for political causes, such as the campaigns for Palestinian rights in the Middle East and the rights of black peoples in Southern Africa.

Even if fuel problems are avoided in the short term, there remains the bleak prospect of energy supply constraints on a much more permanent basis in the longer run, say from the mid-1980s. Quite simply, the way things stand the suppliers of our basic energy forms—oil, natural gas, coal and nuclear power—will find it impossible to keep pace with increasing demand, particularly if it rises at anything like the historical (pre-1973) growth rate of 5.1 per cent.

Since 1973, the slowdown of energy demand growth within those countries covered by the International Energy Agency has been "dramatic" as a new IEA report on energy conservation points out. Between 1973 and 1977 the annual growth in total primary energy fell to just 0.8 per cent. In at least four countries—West Germany, Ireland, Luxembourg and the UK—there was actually a drop in energy use during this period.

It is difficult to pinpoint accurately the cause of this trend. Of course, reduced economic growth dampened demand considerably. Within the IEA countries, the Gross Domestic Product rose by only 1.6 per cent a year from 1973 to 1977, as

against 4.5 per cent in the previous five years. Higher energy prices also reduced energy demand. On top of all this, but hard to quantify, was the determined effort of many consumers to use energy supplies more sparingly.

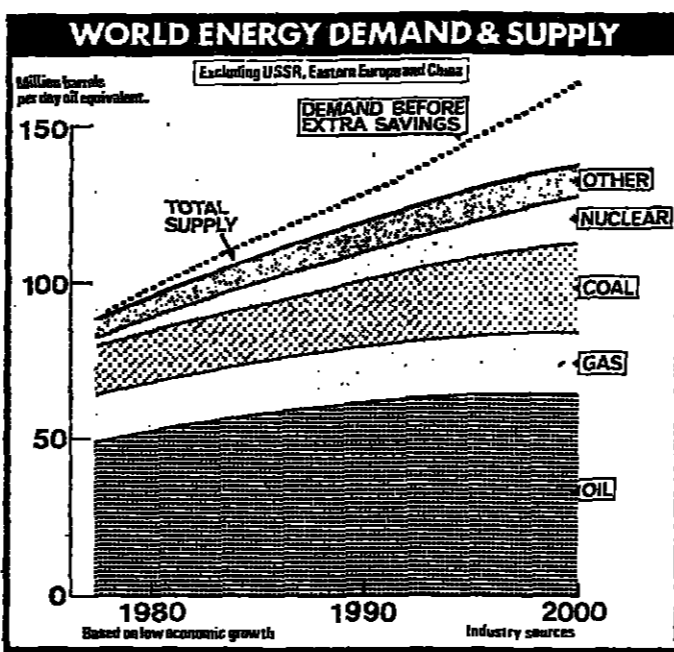
Impetus

It is to be hoped that during this month's International Energy Conservation Month—the thousands of special events being staged around the world will add new impetus to the drive towards greater energy efficiency. Success is essential. For belatedly energy conservation is now becoming recognised as a key to economic stability in times of uncertain fuel supplies and fast-rising prices.

A concerted effort on conservation could achieve as much as a full-scale expansion of nuclear energy, the development of alternative energies or accelerated growth in international coal trading. Furthermore, its implementation will not be inhibited by environmental pressures, protracted public inquiries and the strangling mesh of energy regulations.

Sound energy management and conservation walk hand in hand. Together they can achieve extra savings which by the year 2000 could reduce non-communist world energy demand by at least 25m barrels a day of oil equivalent (bdoe), according to a Shell Briefing Service report, "Energy and the Investment Challenge," published last month. To put that into perspective, that level of saving equates with over a quarter of all the non-communist world's energy consumption in 1978—far more than the total consumption of either gas or coal.

But as Shell points out,



matching even this reduced demand in AD 2000 would require an extra 50m bdoe of energy supply, more than two thirds of which would have to come from non-oil sources. With so many pressures impeding the development of these sources, particularly nuclear power and coal, it is a moot point whether the demand can be met. The only other alternative is even greater conservation effort.

British Petroleum, in one of its briefing papers—"Oil Crisis... Again?"—published a few days ago, sounded a similar warning. "The energy crisis is here," the company stated. "We have to choose between foregoing economic growth or starting to grow without more oil." To emphasise the fact, it produced statistics showing how

world oil production could well begin to decline from the mid-1980s. Projecting just a 3 per cent growth in oil demand (less than half the pre-1973 trend), BP found that by the mid-1990s, non-communist countries could find themselves "short" of perhaps 30m barrels of oil a day, a gap that would have to be filled by other fuels, improved energy efficiency and loss of economic growth.

It is no use disguising the fact: the problems are formidable. So it is just as well that in connection with Energy Conservation Month the "big guns" are firing the warning shots. In the UK, Prince Philip, in a message to launch the month, pointed out that one of Parkinson's Laws was that demand rose to meet supply. "But he

doesn't go on to say what happens when supply starts to drop behind demand, yet this is a problem which has confronted all the civilisations of history." Do not waste what is left, was the Prince's message.

President Carter delivered a similar plea in the U.S.—"America faces the most serious domestic challenge that it is likely to face in our lifetime: the energy challenge. Our ability to meet this challenge will help determine whether we will be able to maintain our American way of life during the closing decades of the 20th century."

Stirring stuff. But the U.S. bears heavy responsibility for creating much of the energy supply pressure, not only in its own country but worldwide. It has long been criticised for being a prodigal user of fuel.

The incriminating evidence is contained in the IEA's 1978 review of energy conservation, published on September 28. This shows that the U.S. uses more energy per person than almost any other country in the world. In 1977, for instance, its total primary energy per capita ratio was 8.28 tonnes of oil equivalent—220 per cent more than the amount consumed in the UK and well over 10 times the ratio in another IEA member, Turkey. What is more disturbing is the fact that the U.S. ratio even rose slightly above the 1973 level.

And yet, for all the presidential rhetoric (past and present) we find that the U.S. budget for its energy conservation publicity campaign last year was the lowest recorded within the IEA; in terms of dollars per capita just 0.01 as against 0.07 in the UK and an impressive 0.28 in Canada.

It is easy to see why the U.S. is the butt of so much criticism, for quite apart from its apparent

excess of energy usage the country does have sufficient resources to satisfy not only its own needs but those of other countries as well.

The U.S. may be the largest user of energy and the largest importer of oil. But it also contains 75 per cent of the potential for expanding coal production and 50 per cent of nuclear output in the non-Communist world in the medium term. There is also scope for increasing its oil and gas production. "Uncertainty about United States demand on the world oil market is at least as great as uncertainty about OPEC supply in, say, 1985," states BP.

Credit

That said, the U.S. must be given some credit for at least starting to trim its energy usage. Its energy input per unit of industrial production in 1977-78 was about 20 per cent below the 1970-73 average, according to BP. The energy saving steps taken by the larger corporations and the energy supply companies themselves (for they are among their own biggest customers) contributed greatly to this drop. Within the Organisation for Economic Co-operation and Development as a whole the reduction in industrial use fell by 7 per cent on average.

And while personal energy consumption per unit of Gross Domestic Product actually rose by 8 per cent in the OECD countries between 1974 and 1977, the U.S. recorded an improvement of about 7 per cent. But it could do so much more. The typical American car is still a "gas guzzler" when set alongside the European or Japanese counterpart; American

cars' homes remain overheated in winter and over-cooled in summer.

In the U.S. cars account for about 31 per cent of all the oil consumed. If every driver of the more than 100m cars together with those in some 20m light trucks, reduced their petrol consumption by just 5 per cent the savings would be the equivalent of some 200,000 barrels of high-value gasoline every day. If every household lowered its average heating temperatures by just 8 degrees, another 570,000 barrels of oil a day would be conserved. And if air-conditioning temperatures were raised by 6 degrees the savings would amount to 100,000 b/d. Here, with three very modest adjustments in living standards, we have the blueprint for savings worth 1.12m b/d—more than the combined output of Dubai, Qatar and Oman. So much more could be achieved with better insulated homes and more efficient manufacturing and transport systems.

One recent study at Harvard Business School indicates that a more aggressive conservation policy could "provide" almost half of the extra energy that might be needed in the U.S. between 1977 and the late 1980s—the equivalent of 5m b/d. Harvard also teaches its students that there is no such thing as a "free lunch." These savings will have to be won. They cannot be achieved overnight.

Take the case of industry. Shell's excellent report on Energy Efficiency points out that it could take three to eight years for a company to implement some conservation device. The first one or two years might be taken in evaluating whether prices will stay high; the next

CONTINUED ON NEXT PAGE

ENERGY BLUEPRINT

Energy saving in office buildings—a continuing process

In creating the right internal environment for people to work in, there are no short cuts. Patient accumulation of expertise is needed to refine techniques and to achieve necessary comfort standards.

Four office buildings, designed and built over a ten-year period, by the Yorkshire Electricity Board are an excellent example of this process. In a comparison between the first and latest buildings, energy consumption has been nearly halved. But the same good environmental standards have been maintained.

Even by today's standards, the first building in the series performs acceptably. Each successive building reflects the experience gained by the Electricity Board in the development process. And taken together, they are solid evidence that economy and a comfortable environment can and should go together. So all the buildings incorporated air conditioning and waste heat recovery techniques, with lighting designed to suit individual work areas.

To contain rising energy costs, efficient insulation was high on the list of priorities. For instance, none of the buildings has a glazed area of more than 30 per cent—usually adequate for visual purposes but extremely energy inefficient.

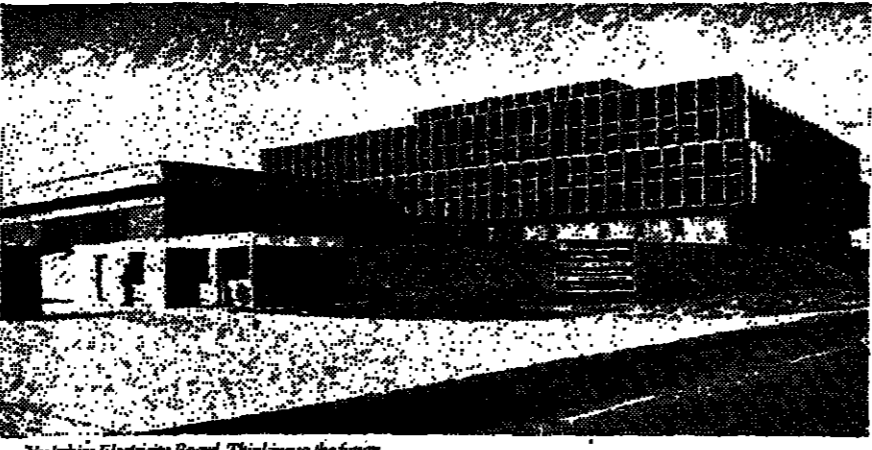
Changes made in successive designs aimed mainly at tailoring the building services to suit the specific needs of different work areas. And this individual approach to designing the lighting and heating systems has brought a progressive lowering of energy consumption, as well as pleasing the occupants.

More efficient

Changing the design of the ceiling module in the second and third buildings for instance meant a more efficient lighting system could be used. In these buildings, a new variable volume air conditioning system was introduced, with self-controlling diffuser units. Again, lower energy consumption was the result, with no change in overall standards.

And as in any learning process, benefits accumulate with time. So in the latest building at Scarcroft, Leeds, the Electricity Board's designers were able to draw on their fund of experience to make more radical changes, improving economy and comfort even further.

But even this sort of improvement is only another stage in a continuing process of refinement. Yorkshire Electricity Board are far from regarding it as the end of the energy saving story—they prefer to see it as merely another successfully completed chapter.



Yorkshire Electricity Board, Thinking to the future.

Light for better colour—and stay in the black

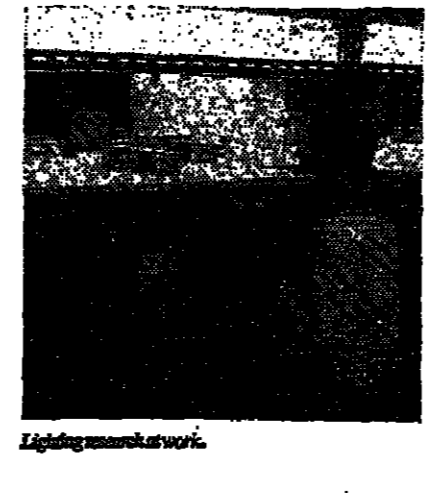
Recent research* into lighting and visual satisfaction by the Electricity Council points to ways of avoiding increased energy costs in situations where colour is important.

The importance of the research lies basically in the fact that the good reproduction of surrounding colours normally depends on using lamps of a lower efficacy. Light out for watts in—and so more are needed for a given illumination level. But now it has been shown that illumination levels may be reduced without any loss of satisfaction, the improved colour compensating for reduced illumination and at no extra cost either. Where precise definition of objects is more important than the accurate reproduction of colours then, of course, a high efficacy lamp will be appropriate.

The application of this research should enable lighting to be applied more effectively across a wide range of buildings, including offices and shops. Because of the obvious importance of colour in hospitals the work on visual clarity has already been incorporated in the Lighting Guide—Hospitals and Health Code Buildings, published by the Chartered Institution of Building Services

and accepted by the Department of Health and Social Security. *Visual Clarity and Lamp Colour Properties by Dr. E.R. Boyce (ECRC/M944)

For more information tick box No. 2.



Lighting research at work.



16th century buildings heating solved.

Electric heating spans the centuries

Efficient energy management always brings with it the need to be adaptable—but rarely to the extent demanded by a recent electric heating installation in Scotland.

When International Insurance Brokers Whitehouse, Moorman and Partners Ltd. decided to renovate a 16th century schoolhouse for their new office HQ, flexibility was the first consideration. Conventional heating systems were out of the question. Gradual additions to the building had resulted in an eccentrically placed series of rooms on three levels—delightful for occupants, a headache for the heating engineer.

Installation of a fuel-fired radiator system would have meant tortuous and unsightly pipework. In addition, as insurance experts, the owners fully appreciated the danger of leaks from wet systems, especially to the fabric of older buildings.

Flexible

The flexible electric system which was chosen is both unobtrusive and clean. Following discussions with the Midlands Electricity Board the system was designed by Eurohous Services Ltd. to make the very best use of electricity tariffs for maximum economy.

Basic background heating is by an underfloor system using off-peak electricity. Under a daylight maximum demand tariff up to 36 kW of electric panel heating can be switched on towards the end of the cheap night period to top up the underfloor heating and bring the building up to full comfort temperature by 8.30 am. So the basic heating is charged at off-peak rates.

This is supplemented in each office by direct acting panel heaters with integral temperature control, leaving occupants free to choose their own level of heating individually.

Company chairman Mr Whitehouse has no reservations at all, though he is not anxious to experience another winter as cold as the last. Even so, he says, "the system coped admirably both first thing in the morning and throughout the day."

For more information on electric heating tick box No. 2.

Mothercare's heat pumps save space and money

Mothercare's heating and ventilating problems at their new Woking branch were the same as those faced by most successful retail organisations. The simplest, most complete solution finally proved to be an integrated heating, cooling and ventilating system, all centring on the use of a heat pump. The system is also able to save up to 40 per cent of the energy used for heating.

The problem was to maintain a comfortable environment for shoppers and staff to meet the changing internal heat gains of a crowded, brightly lit store.

And, obviously, the better business becomes, the greater the problem. Added to this was the possibility of fumes and dust caused by open-door trading. An integrated heating/cooling system was needed to give fast response and cost effective temperature control. But bulky equipment in the store would take up valuable selling space.

All the possibilities were assessed by Mothercare together with consultant

designer Ian Wilkinson. "Finally," he says "we decided on a heat pump because it met all our criteria. Most important, it provides an integrated heating, cooling and ventilating system. It can be mounted outside, thus overcoming the space problem; and customers and staff are happy in the clean, fresh environment it provides."

Best of all, the 40 per cent saving on heating is possible because, operating in its heating mode, the heat pump extracts heat from the air outside the shop, upgrades it, and then re-uses it. In this way it can actually produce more energy than it consumes.

At this bonus is available at only marginally greater installation cost than that of air conditioning alone. Small wonder that Mothercare are now planning similar installations in 20-30 other shops throughout the country.

For more information on heat recovery tick box No. 3



Mothercare, 40 per cent saving on heating.

Please send me copies of leaflets/information on the following topics. Please tick appropriate boxes.

1. Lighting Research

2. Electric Heating

3. Heat Recovery

NAME _____

ADDRESS _____

POSITION _____

FTES _____

Using our energy can save yours.

PLANELECTRIC

The Electricity Council, England and Wales.

Please send the coupon to: Simon Stevens, The Electricity Council, 30 Millbank, London SW1P 4RD.

The shortages conundrum

THE PERPETUAL conundrum facing energy users is this: there are plentiful reserves of all types of fuel still to be exploited, so why is it that politicians and energy planners keep talking of shortages? And why is it that even when proven reserves are known to be sufficient to meet demand for scores of years pundits insist that the world will soon "run out of fuel"?

The answers lie in the midst of a complex maze of ill-defined facts and tentative judgments. So far no one—not even the International Energy Agency—has been able to come up with a guaranteed forecast of future energy supplies. This is hardly surprising, considering the factors involved.

First there is the resource base, the amount of fossil fuel trapped in the earth's crust. Geologists have made educated guesses about the ultimate extent of these resources but the total amount of fuel that can be used—the recoverable reserves—will not be known until the last tonne, barrel or cubic metre has been mined or pumped out of the ground.

Take the case of crude oil. The consensus view within the industry is that 2,000bn barrels will be recovered even though proven reserves are put at no more than 650bn barrels. On this basis there is enough proven oil to satisfy demand for over 30 years at current consumption rates. During that time the oil industry will

identify more of those 2,000bn barrels. But we cannot be certain that only the 2,000bn barrels will be extracted. The total amount of oil in the ground is known to be several times larger, possibly as much as 10,000bn barrels. As fuel prices rise, companies will be encouraged to venture into more remote areas to seek possible reserves. And once there they will probably use more sophisticated recovery methods to extract every barrel possible.

On average the oil industry extracts only one-third of the oil in a developed field; the remaining oil is left in the ground, trapped in the microscopic rock pores.

Potential

In the U.S.—one of the most mature oil-producing regions of the world—the Government has at last been moved to encourage companies to use more exotic production methods to improve the recovery efficiency. This is as it should be. For exploiting the earth's proven oil fields to their maximum potential must be as much a part of sound energy management as conservation. If oil is too precious to burn under boilers—as is often said—then it is certainly too valuable to leave in the ground.

The same applies to other fossil fuels. There are vast resources of shale oil and tar sands, so far hardly touched in view of the heavy costs (in both

monetary and energy terms) involved in their extraction. But gradually these resources are becoming more commercially attractive, as demonstrated by the projects now underway or planned in Canada, the U.S. and in South America.

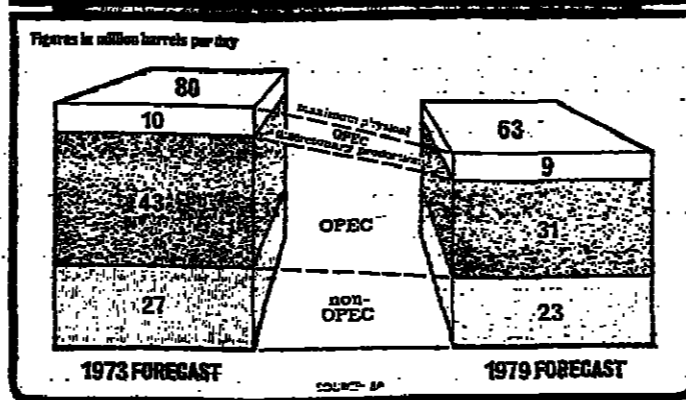
Proven reserves of natural gas are put at some 71.5 trillion (million, million) cubic metres—enough to meet the current level of demand for about 50 years. And still great resources of gas remain unfound and untouched.

Coal holds by far the biggest potential of the fossil fuels. It is reckoned that the world's share of economically recoverable coal would be more than five times bigger than the amount of recoverable oil reserves. Total reserves of all types of coal—including anthracite, bituminous coals and brown coal—have been estimated at 11,000bn tonnes of which about 700bn tonnes are considered to be currently economically recoverable. To put that into perspective, worldwide coal production last year was just 3.5bn tonnes.

Unfortunately for energy consumers in the West, a large proportion of the world's coal resources are in the Communist countries. Russia contains almost 5,000bn tonnes of coal, for instance. China is estimated to have a further 1,400bn tonnes.

The same goes for gas and oil. Russia holds the control

OIL: Non-Communist world forecast production in 1985



over 36 per cent of the world's proven reserves of natural gas and about 11 per cent of proven oil reserves. Of course, the Middle East dominates the world's oil scene; these countries contain about 57 per cent of the reserves.

This raises the second factor in the supply equation. Will the reserves in these regions be exploited at a pace to meet the rising needs of developed countries in the West. The East oil producers have demonstrated in recent years that they are more interested in spinning out their oil and gas resources for as long as possible.

So what about the U.S., the world's biggest energy user and largest importer of oil? In the non-Communist world the U.S. potential for expanding world coal and 50 per cent of nuclear output in the medium term. It can also expand oil and gas production to a limited extent.

Constraints

The fact that the U.S. has been so slow in developing these resources, at least to a point where it can meet its own energy needs, is due to a number of considerations which make up the third part of the equation.

The constraints inhibiting the speedy development of almost all energy forms are considerable. It now takes at least 10 years to plan, gain approval for, and build major energy-producing projects like nuclear power stations and large coal mines. Regulation has been piled on regulation to

a point where projects have been strangled into non-existence by red tape. Standard Oil of Ohio's planned pipeline from the U.S. West Coast is a case in point; the BP subsidiary wanted the pipeline to carry Alaskan crude oil to major markets in the U.S. interior. Confronted by seemingly endless regulatory hurdles, many mounted in the interests of environmental protection, Sohio abandoned the idea. It is now using tankers, sailing via the Panama Canal, instead. Oil refineries and nuclear power stations have been planned and abandoned for similar reasons.

British Petroleum reported in a recent briefing document that in 1974 nuclear power output within member countries of the Organisation for Economic Co-operation and Development—then the equivalent of 60m tonnes of oil a year—might grow to 755m tonnes of oil equivalent (toe) by 1985. By then, it was thought, nuclear power might account for 13 per cent of OECD energy supply. Since then the forecasts have been trimmed to such an extent that last year it was estimated that 1985 nuclear power output within the OECD countries might be no more than 325m toe or 6.5 per cent of total energy supply.

The same goes for coal development. In the U.S., for instance, coal was expected to grow from 335m toe in 1974 to between 675 and 1.26bn toe in 1985. That forecast was made by the U.S. Department of Energy in 1974. Last year the forecast was amended. It was seen highly unlikely that coal output would

rise above 613-730m toe by 1985. It can be argued, of course, that in the light of slower economic growth the output as forecast in the early 1970s would have been unjustified. This introduces the fourth factor in the supply and demand equation. For energy planners are still unsure about how quickly the economy will grow over the next couple of decades and, in consequence, how much extra energy supply will be needed. Much will depend on fuel prices; the International Monetary Fund has already reported that the latest series of oil price rises has caused a bigger impact on world economic growth and inflation than had been previously forecast.

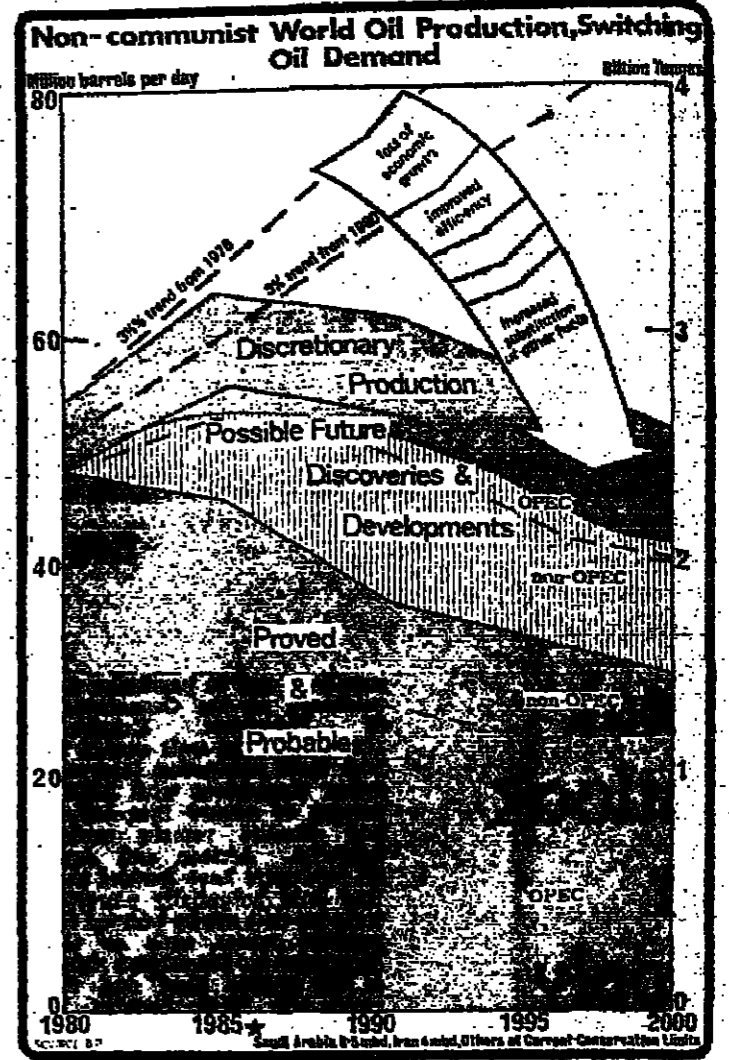
So further pressures will be put on consumers. According to British Petroleum, industrial energy costs rose some 200 per cent between 1970 and 1978, while the consumer energy price index rose by some 150 per cent (since 1974 appreciably more than the rise in the consumer price index).

Energy

Conservation measures will also change the relationship between economic growth and energy growth. Up to now the two have grown roughly in unison, giving a ratio of 1:1. The International Energy Agency expects the ratio of energy growth to economic growth to fall to 0.8:1 during the 1977-88 period. There is no reason why the ratio should not improve much further in later years.

There are some who argue that in countries like the U.S. and the UK a modest growth in the economy over the next couple of decades could be sustained without the need for any extra energy supplies at all. They see it as a case of using those energy sources that are available much more efficiently. On this basis, then, it is little wonder that those faced with investing in massive new energy projects are concerned about future trends.

On balance, it seems that energy demand will continue to grow, although at nothing like the rate forecast a few years ago. Even forecasts made two years ago are likely to be proved well wide of the mark.



In 1977, for instance, the Workshop on Alternative Energy Strategies—a major international energy forecasting project sponsored by the Massachusetts Institute of Technology—reported that it could see total energy demand in non-Communist countries growing from the 1972 level of 30m barrels a day of oil equivalent to between 160m and 207m b/d by the turn of the century.

Shell, one of the participants in the WAES project, has produced one of the latest forecasts now circulating in the energy industry. This shows that non-Communist demand could grow to no more than about 140m b/d of oil equivalent by the year 2000, assuming that further energy savings will be achieved over the next two decades. Even on this basis Shell points out that the energy industry will have to provide an extra 50m b/d of supplies, more than two-thirds of which would have to come from non-oil sources like nuclear power and coal. Shell thinks that oil supply in non-Communist areas will rise from the present level of around 50m b/d and plateau in the 1990s at around 65m b/d. However, another very recent

energy projection—this time from British Petroleum—suggests that the non-Communist world should not rely on receiving more than about 54m b/d of oil supplies, of which 30m-32m b/d might come from OPEC countries. BP sees this peak of output being reached around 1985 with supplies then dropping to around 45m b/d by the end of the century. More oil might be available, says BP, but this would depend on OPEC producers opening the few valves to a much greater extent than they seem willing to do at present.

So clearly, the energy industry's nervousness is justified. OPEC holds the key. Within its power lies the possibility of adequate supplies of oil—and thus energy—into the next century. It can also squeeze consumers to a far greater extent than attempted so far. And if this happens major energy users like the U.S., Japan and Europe will rue the fact that they have not done more to speed the development of non-oil energy projects, particularly coal mining and nuclear electricity generation. **Ray Dafter**

Outlook

CONTINUED FROM PREVIOUS PAGE

one to three years could be spent on analysing the impact of existing and future regulation standards and on considering various design choices, and the third period of one to three years might be spent on ordering and construction work.

Unfortunately, by delaying until now our concerted drive towards more conservation, we have become trapped in a Catch-22 position. The worldwide demand for energy is putting so much pressure on the available supplies of oil that prices are rising rapidly. This in turn has badly hit the

energy management, however. It is to be hoped that if the various rounds of talks contemplated between oil producers and consumers begin in earnest some understanding about supplies and pricing will be reached and if shortages and further big price increases can be avoided over the next few years consuming countries will do more than they have in the past to demonstrate that they recognise the delicate balance of supply and demand and are willing to take stronger measures to curb their thirst for fuel.

Understanding

Much can still be done through good housekeeping and

Coal offers hope as alternative fuel

BP Energy Research Prize

As part of its involvement in energy and conservation, BP has established the BP Energy Research Prize.

The aim of the Awards Scheme is to provide a further stimulus to the development of new ideas concerned with energy conservation and the better utilisation of energy resources.

In the UK, awards to support research programmes and prizes totalling £50,000 will be made available.

The winning project will be the UK entry for the BP International Energy Research Prize.

Judging
Provided by the Royal Society in association with the Fellowship of Engineering.

UK Awards
Three awards, each of £10,000 to support three selected research projects for one year. The winning project will receive a prize of £5,000 plus £10,000 towards a further year's research.

International Prizes
An international competition open to research projects nominated by BP associate companies overseas. The first prize will be £10,000.

Full details and entry forms obtainable from: BP Energy Research Prize, Britannic House, Moor Lane, London EC2Y 9BU.

Closing date for receipt of completed entry forms is 10th December, 1979.



THE WORLD has lived without oil and natural gas in the past. It can do so again. But the wearing-away is likely to be stressful, even traumatic.

The fact is that the search for substitutes is to seek substitutes as nearly equivalent as possible to fluid hydrocarbons. Natural gas is hard to give up where once its benefits have been enjoyed. So is oil, and in some sectors excessively hard.

Liquid fuel has become inseparable from transport. Aircraft and off-road vehicles seem scarcely conceivable without internal combustion engines resist the imagination as much as once did cars without horses. Seamen's hearts sink as they listen to threats of deteriorating and declining supplies of oil for their ships.

Coal offers hope to all who espouse for fluid fuel. After all, the liquefaction and gasification of coal have been possible for a long time. New technology is being sought only for economic reasons. The heavy mineral, expensive, but liquefied into premium fuels, consistently outperforms its naturally fluid hydrocarbon cousins, despite all the impost of the sheikhs, the oil companies and the tax gatherers.

Efficient

That is why, as oil and gas get dearer, coal may win back its primacy in the market first as a solid fuel, though for burning by more efficient means than in the past. Thus coal could fire new-style fluidised-bed boilers to raise steam for ships' turbines or railway locomotives. One way or another coal undoubtedly will fuel many more power stations, but liquefied it could sustain the engines of aircraft, cars and ships.

South Africa is the most advanced towards large-scale commercial liquefaction, having persisted in the development of the Fischer-Tropsch process that provided Germany with more than 3m tons of oil a year during the 1938-45 war. South Africa's State-owned Sasol plants are expected to reach nearly the same output in a few years' time, meeting about 20 per cent of the country's oil needs. Now Sasol has signed up with the American construction company, Fluor, to exploit this process in the U.S.

The Fischer-Tropsch process

breaks coal down into chemically very simple substances and then reconstitutes it catalytically into more valuable liquid forms. Research and development in Britain, the U.S. and elsewhere look beyond this apparently rather wasteful method to processes that might conserve some of the complex and useful substances in coal. It is too early to spot winners among all these processes or even to guess the length of the race.

Dr. Joseph Gibson, board member for science of the National Coal Board, while carefully saying first that no firm predictions can be made, has estimated on "reasonable assumptions about future price movements" that liquid fuels from coal could be economic in Britain by the turn of the century. In the U.S., where coal is more easily mined and the demand for premium fuels more intense, the turning point could be reached much sooner.

To show how much the earth's stock of coal exceeds its stock of oil and natural gas, Dr. Gibson points out that coal could sustain the world at its present rate of energy consumption for about 250 years, whereas oil and natural gas could not do so for more than 35-40 years. However, King Coal cannot be restored to his throne by a stroke of the pen.

While coal is more equitably bestowed on the regions of the world than oil, its blessings are still not uniform. Its quality is variable; so is its accessibility. Can it be mined and distributed at the rate the world requires, by the time the oil pinch makes itself felt?

Suppose it can, and that the poorer coals are burnt to generate electricity. Plant to produce the premium gas and liquid fuels necessary for other purposes will take decades to bring into operation on any substantial scale, and annual capital investments of billions could be necessary. All this means that the phasing-out of oil and natural gas and the phasing-in of coal and coal derivatives will not always and everywhere dovetail together, even supposing that total transfer to coal is desirable.

Arguable it is not desirable. Coal, like petroleum, tar sands, oil shale and fossil fuels generally, is a precious raw material. To burn this, if there is an alternative, is imprudent. Moreover, if burnt, this global

stock of fossil hydrocarbons will release carbon dioxide on a scale that might (nobody yet knows for sure) cause adverse changes in the earth's climate.

There are other pollutants that also present difficulties. Dispersed in the atmosphere the products of combustion are beyond recall. Ideally, all the useless pollutants would be trapped at the point of generation, condensed, encapsulated and locked away underground, out of harm's way.

Hazardous

That, of course, is what in principle is done with the pollutants from another fuel—uranium. However, nuclear power is under a cloud because the pollutants and byproducts it yields are by some deemed potentially more hazardous than those of coal power. Yet the technology of nuclear power is well advanced, its safety record (despite some cliffhangers) is very good, and its protagonists maintain that the residual technical risks can all be reduced to an acceptable minimum. The possible contribution to the world's energy supply is enormous, if fast-breeder reactors are brought into the picture as nuclear engineers always imagined they would have to be to make full use of the uranium that is available.

The thermal fission reactors used in today's nuclear power stations can get at less than 1 per cent of the energy latent in natural uranium. With fast-breeder reactors a great part of the balance can be turned to account. Thus a tonne of uranium, instead of equaling a mere 30,000 tonnes of coal, can equal about 2m tonnes. Given the fast breeders, then, the world's electricity supplies might be secured for a number of centuries. Fossil hydrocarbons would be conserved for as long as possible. Hydrogen and synthetic hydrocarbon fuels could readily be produced.

It is a rosy picture. But for the present a transition to such an energy utopia looks difficult. Apart from the problems of political opposition to nuclear power there are the techno-economic problems. Lead times are as significant as in coal power. Some industrial countries are already 10 to 20 per cent nuclear in their electricity generation but hopes are being whittled away of nuclear cap-

acity expanded sufficiently to fill worldwide the gap that may be left by dwindling petroleum resources. A severe energy crisis, nuclear fission reactions powering the sun.

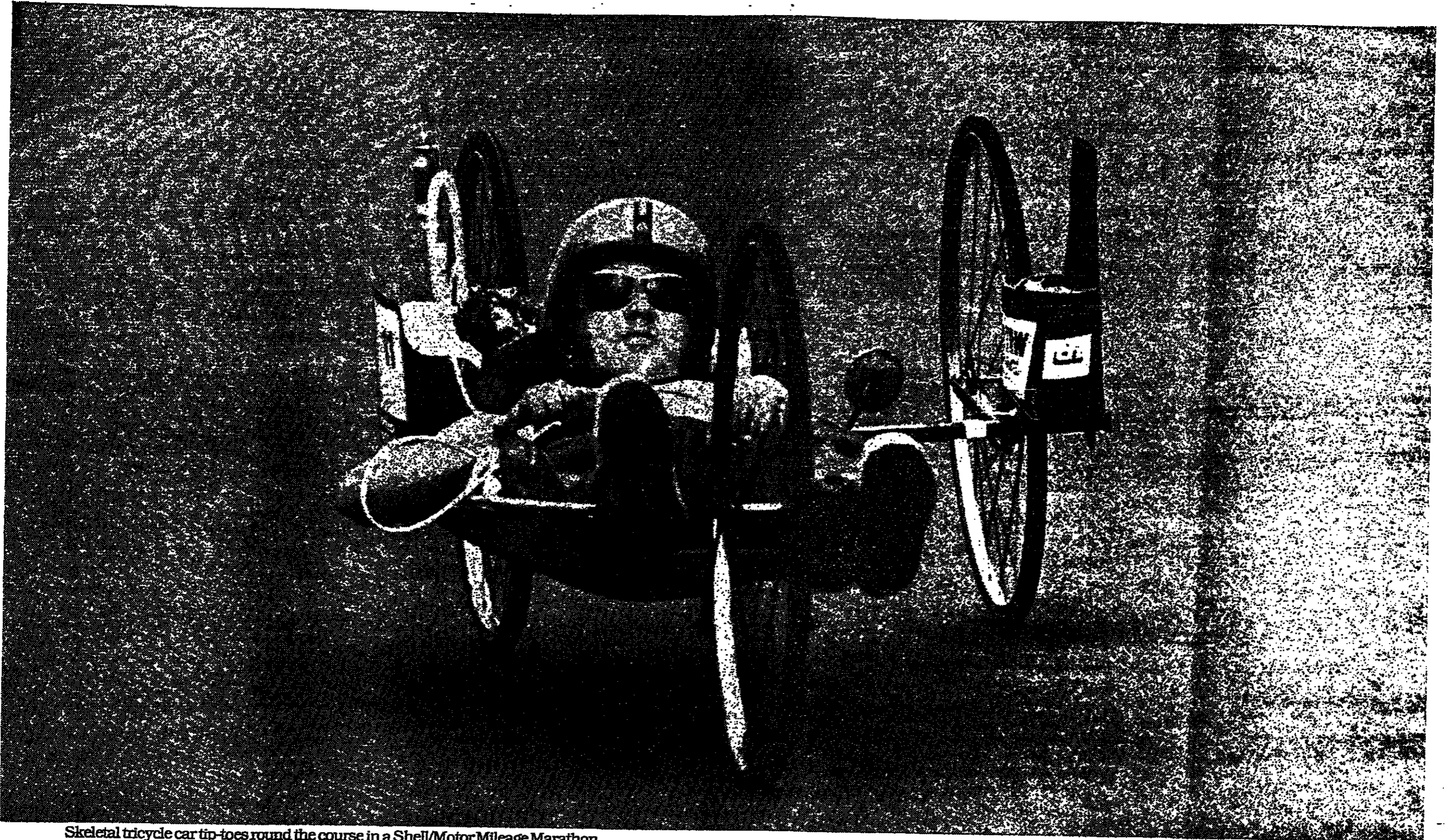
All the programmes are any way in terms of conventional thermal fission reactors. This fast breeder is still at best an advanced experiment, even in France, which has been the least inhibited of all Western countries in advancing the breeder's development. Still more remote is the most dramatic nuclear reactor of them all, the tamed H-bomb that spurs the thermonuclear fusion reactions powering the sun.

The sun is the origin of most terrestrial energy. All life depends on it. Vegetation's annual output of carbon, by natural processes employing solar energy, is ten times the coal equivalent of mankind's present annual energy consumption.

Yet the energy crisis in Third World countries is often in practical terms a breeding crisis. Modern methods could bring not just rawwood but a whole range of byproducts into wider use. Brazil and other countries are planning to use fermentation alcohol widely as a petrol substitute. In the Chinese province, as a model for other provinces to follow, 7m pits are generating biogas from vegetable and animal wastes. In these and many other ways biofuels from recently-living matter could within the foreseeable future supplement fossil fuels from very-long-dead matter.

Solar energy can be exploited more directly to aid energy conservation in buildings. Redirected and concentrated sunshine can use steam to generate electricity. Solar cells can generate the electricity without intermediaries. Daughters of solar energy—the winds and the waves—are also being investigated. So is geothermal energy.

Technically attractive hydroelectric and tidal power options offer themselves in some situations, but there is not always the capital to take up such options. All these and other alternative energy sources are being studied with varying degrees of fervour and financial support. No dispassionate observer today can be sure to what extent any of them might help to narrow the gap that may open when world petroleum production physically can no longer keep pace with energy demand. **Arthur Conway**



Skeletal tricycle car tip-toes round the course in a Shell/Motor Mileage Marathon.

What use are Shell's mileage marathons?



Roger Lindsay, Shell Technical Manager.

"The object of Shell's Mileage Marathons is to find out who can travel furthest on a measured amount of fuel. In an event where even the losers turn in spectacular performances, the winners' achievements seem almost miraculous. The record now stands at 2,700 mpg! Last year it was 2,000. But do these astonishing feats contribute anything to the development of your family car?"

The answer is yes. Although they are not test-beds for break-through engineering, to build a winner you have to follow the rules of fuel economy. For the many students who participate, Marathons are a good opportunity to practise the theories learned in the lecture room and laboratory. For experienced engineers, they are an opportunity for discussion and interchange. For the Shell engineers who invented the sport, Mileage Marathons are directly relevant to their research projects, many of which deal with the improvement of fuel economy.

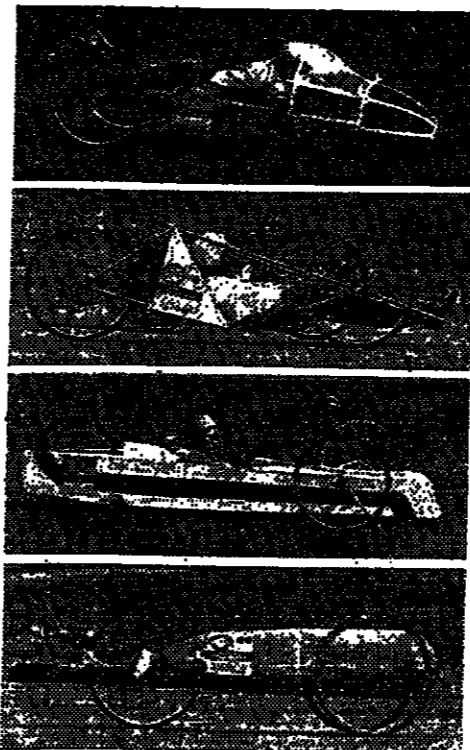
How many miles per gallon for your car?

New developments in car and engine will bring big improvements in fuel consumption, but when and how much? Shell scientists foresee that cars will show a dramatic improvement in mpg over the next few years. Since 1974, some manufacturers have already achieved around 15% improvement.

What is Shell doing to help?

At Thornton, near Liverpool, Shell engineers test new engine designs for motor manufacturers. The object is to measure minutely their degree of fuel efficiency over the complete range of driving conditions.

The feedback which Shell gives manufacturers helps to eliminate problems and make improvements. It sounds simple, but the work requires sophisticated measuring equipment and techniques. For example, Shell scientists are developing ways of using laser beams to map the distribution and patterns of turbulence of petrol mixture in the combustion chamber at the precise moment of ignition. Manufacturers will be able to use this information to modify cylinder head shapes and produce improvements in performance.



Entrants come in all shapes and sizes.

Alternative fuels

Alcohol and alcohol petrol mixtures are now on sale in a few countries and other new fuel components may come along. Shell evaluates the performance of the likely-looking alternatives with a view to stretching oil supplies into the next century.

There is also important Shell research going on into the "fuel cell," a device which directly and very efficiently converts fuel (such as methanol) into electricity.

Fuel for future internal combustion engines

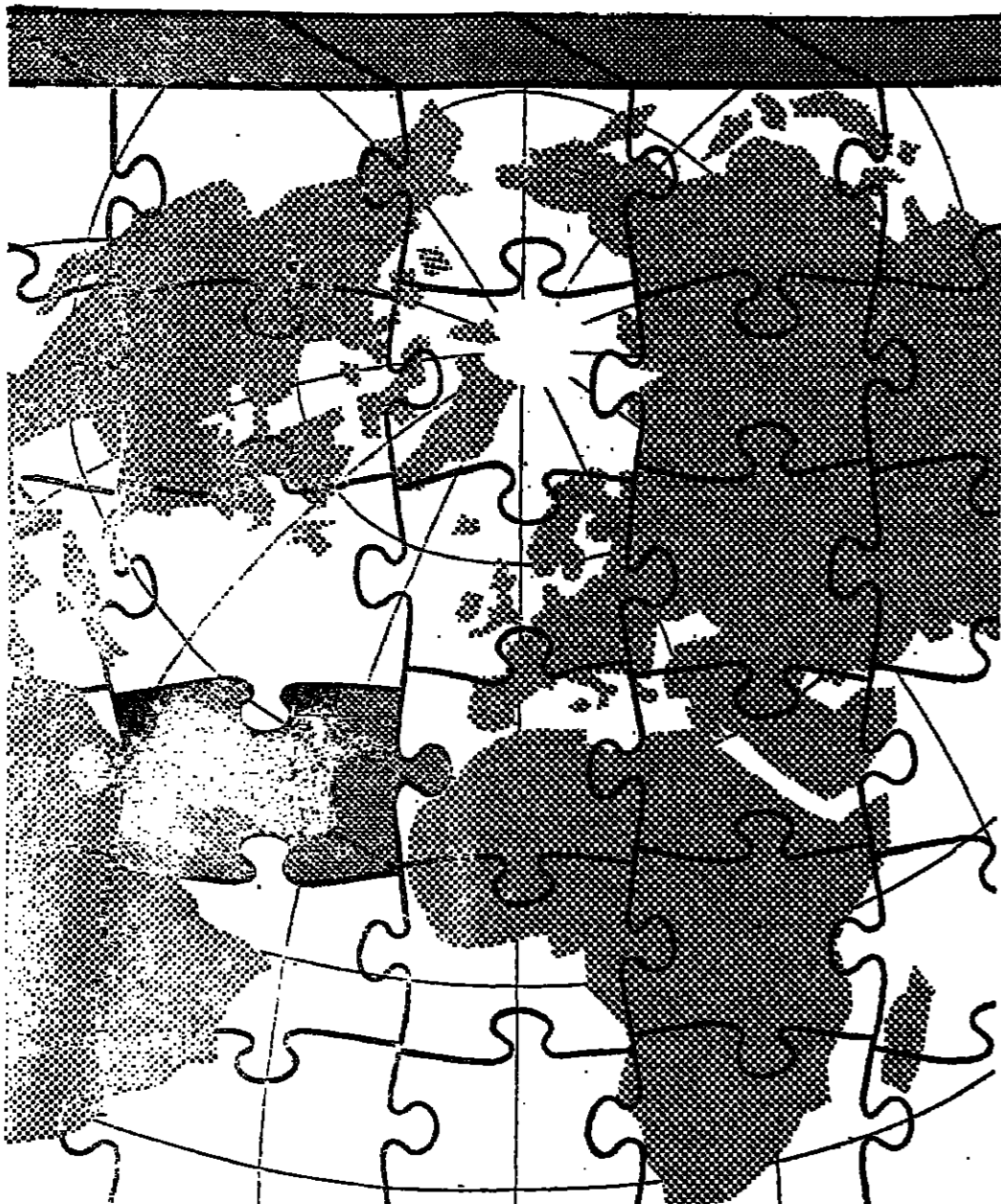
Most motor manufacturers are trying hard for better fuel consumption. Their work has, however, to take into account the economics of mass production and the requirements of pollution control. Nevertheless, there are considerable advances being made on many fronts. It is part of Shell's job to ensure that fuels advance with engine design."



Energy sense from Shell.

INTERNATIONAL ENERGY MANAGEMENT IV

Efforts to find savings cross national barriers



INTERNATIONAL energy-saving efforts are often soured by political disunity and national rivalry. But at the scientific, technical and industrial levels, attempts to overcome the petrol shortage transcend national boundaries.

Many of these efforts are being carried out under the aegis of the International Energy Agency and of the European Economic Community. But there are others which receive less attention in the Press. European countries on both sides of the Iron Curtain have been discussing energy saving within the United Nations Economic Committee for Europe. Energy studies have been carried out by Nato's aptly-named Committee for the Challenges of Modern Society. Another form is the four-yearly world energy conference, to be held next year in Munich.

Then there are the international conferences held independently by the fuel industries, such as "Unical" (the international conference on large systems), and exchanges of ideas by energy-conscious industries like aluminium, paper or chemicals through their international federations.

It is, however, to the IEA that one turns for something approximating an international strategy. The IEA was set up in November 1974, at the height of the energy crisis which followed the 1973 Middle East War. It has become the acknowledged forum for the world's attempt to cut oil consumption, through greater efficiency and the development of alternative fuels.

An autonomous body within the Organisation for Economic Co-operation and Development it is beginning to acquire a voice of its own, with an international audience. This was apparent in its sharp criticism of the insufficient conservation measures by seven of its members in its recent review of 1978 policies. It is also evident in the current International Energy Conservation month, held under IEA auspices.

The IEA's first function was to act as an emergency stockpile for those of its members whose oil supplies dropped by seven per cent. So far it has not had to respond to such a

call. Its other prime task was to foster alternative energy sources and energy research, development and demonstration (RDD).

The cost of the direct co-operative effort by IEA members was put at \$200m last year and is bound to have increased since then. It covers the whole spectrum of RD and D—from advanced research into nuclear fusion and cheap production of hydrogen, to make familiar experimentation with wind, sun and wave power, geothermal energy, biomass conversion and industrial and domestic heat recovery methods.

The programme on heat pump systems had the support of 10 countries. Although many pumps are in use today, most are used for cooling or combined cooling and heating in certain climates. But in exclusively heating applications, the heat pump technology is just at the point of commercialisation. Austria, Germany, Ireland, Italy, Holland, New Zealand, Sweden, Switzerland and the U.S. are engaged in the IEA heat pump programmes.

Exchange

IEA research into heat transfer and exchange techniques is being carried out in five countries—Sweden, Switzerland, the UK, the U.S. and Holland.

Coal technology is one of the biggest areas of research. Projects include a fluidised-bed combustion plant at Grimsby, Yorkshire, and a \$12m gasification pilot plant at Voelkingen, West Germany. Germany, with Sweden and the UK, is also engaged in studies of pyrolysis—to see what happens to coal when it is heated in the absence of oxygen.

Solar heating systems are being studied by several countries not only for heating and cooling of buildings but also as a source of electric power, for which the IEA is sponsoring a pilot plant. Extraction of clean fuel from biomass—plant tissue and biological waste—is being studied by Belgium, Canada, Ireland, Sweden and the U.S. Given the abundance of the raw materials, the long-term importance of biomass energy could be considerable.

Four countries with long stretches of coastline—Canada, Japan, the UK and U.S.—are participating in the IEA's study of wavepower electricity, while wind power projects are being

built in Denmark, Germany, Sweden and U.S., supported by six more countries.

All these are only part of the enormous national and international effort going into energy research, and yet they still amount to little more than a beginning.

The same is true of the European Economic Community's energy conservation programme which, like the IEA, was born in the year after the Yom Kippur War. A recent House of Lords report pointed out that the EEC had yet to draw up a common approach to the major energy issues for coming years, namely mandatory measures and fuel pricing policy.

"The precise role which the Community can play remains obscure," the report said. It complained about the slender resources which the EEC had devoted to conservation and criticised the priorities allotted to research resources.

While this may be true in broad international terms, it does not apply to the EEC's approved energy-saving demonstration projects. The first allocation, of \$36m, over four years, was approved last year and nine British concerns won some of the £14m allotted in the first round.

A further \$70m, for a second four-year period, was approved a few weeks ago. It will be used for programmes on solar and geothermal energy; production and utilisation of hydrogen; and energy systems analysis and strategy studies. It will also support the installation and assessment of new technology in full scale commercial applications.

Such schemes, however, might not have been possible without a growing consensus among EEC member states about energy sharing as well. Final agreement on how to keep the EEC's annual net oil imports down to 1978 levels between now and 1985 was reached on September 26. While agreeing to hold its total imports down each year, the EEC has left members' share of this burden flexible in the short term.

Member States therefore will be eagerly comparing their own records on conservation with those of the rest of the industrial world. The pooling of this information is another of the functions performed by the IEA on behalf of its 20 members and of France, which is indirectly associated with it through the OECD.

A summary of conservation

policies in IEA members, published last week, provides further evidence of the way they are trying to tackle their own particular energy problems.

The following extracts highlight some of their key decisions in buildings, transport and industry.

AUSTRIA: The Federal authorities have rejected plans for new oil-fired power stations and insisted on increased usage of coal, especially lignite, which is available in large quantities. But this can be pursued only in agreement with the Laender (provincial states). An association has been formed for the revitalisation of small-sized, industry-owned electrical capacity (up to 240MW). Austria may soon propose a project to the IEA showing that isomer separation can cut crude oil consumption by 7 to 10 per cent.

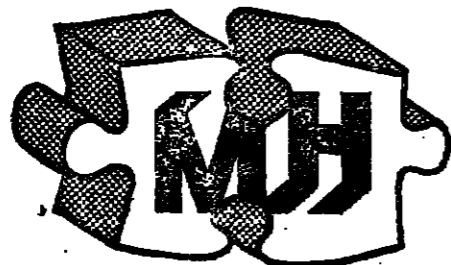
BELGIUM: So far, emphasis has been placed on information campaigns. Grants of up to 25 per cent of investments have been made available for insulating existing buildings, but owing to cumbersome administrative procedures only half the applications have been dealt with. Measures envisaged for industry include energy audits, and fiscal and financial incentives to invest in energy saving, including combined heat and power (CHP). For transport, the only special measures are speed limits.

CANADA: Grants are available to householders of up to \$350 to cover two-thirds of insulation costs. Computerised energy consumption analysis is also available. There are plans to cut energy consumption by 10 per cent in public buildings from the 1975-76 level and peg it for 10 years. Other measures are voluntary target setting and reporting systems established by 13 conservation task forces; accelerated write off on CHP equipment.

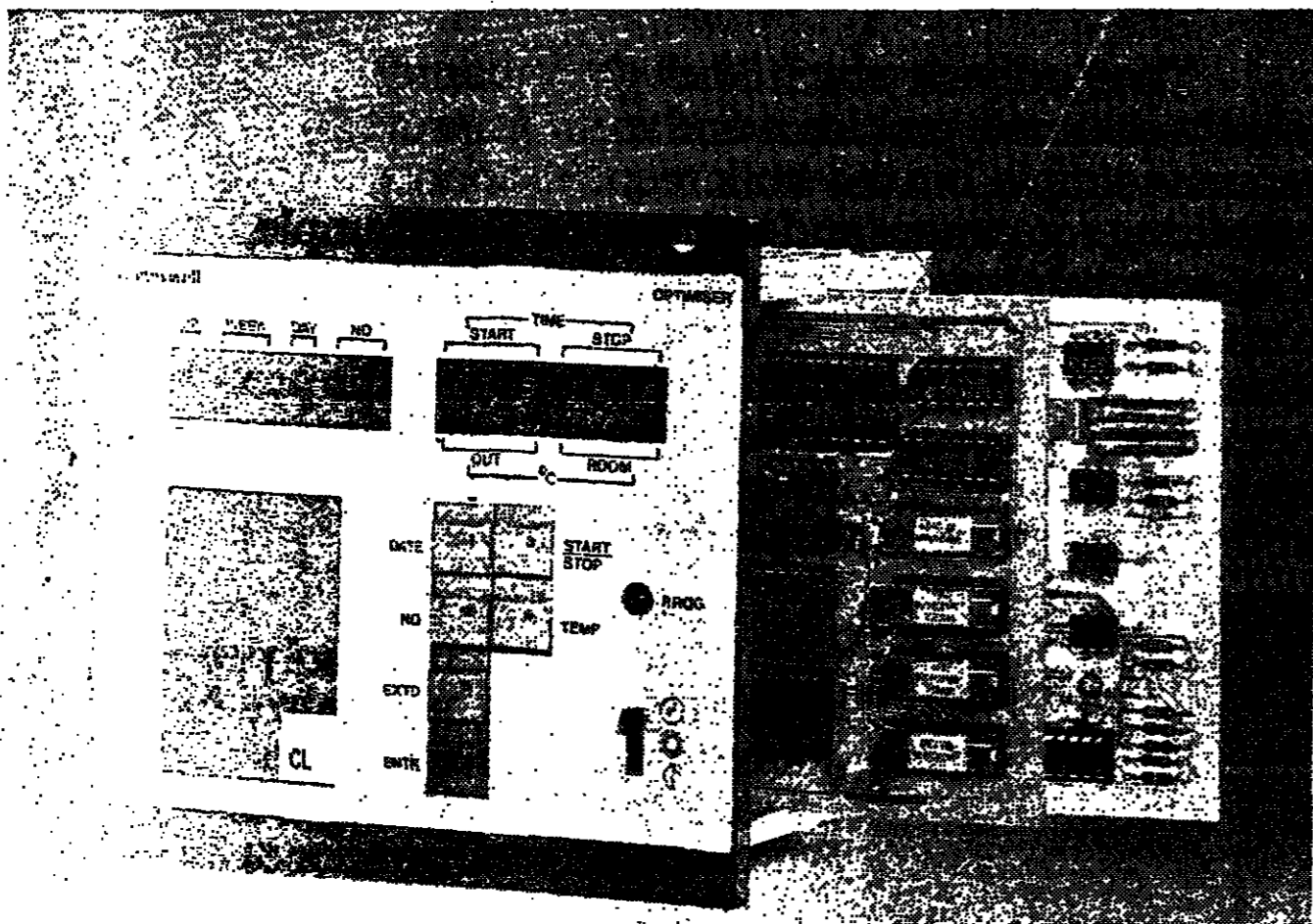
GERMANY: A programme of grants and tax concessions to improve conservation in residential buildings was launched last year. It is expected to cost DM 4.55bn over five years, to stimulate up to DM 20bn of investments, and to save 1.5m tons of oil equivalent per annum. Industry has been offered 7½ per cent grants for energy saving investment; and a total of DM 20m has been set aside in 1979-80 for introducing new technologies. On the roads: revised standards for measuring consumption by cars; and petrol saving techniques are part of the driving test.

GREECE: Net oil imports are expected to double by 1980, with some oil to be produced domestically from 1982. By 1990, Greece's dependence on oil should decline to about 56 per cent of total requirements—oil imports were 71 per cent of total energy demand in 1977. **FRANCE:** has a coherent energy conservation policy coupled with diversification of resources to modify the country's energy balance. The conservation programme relies heavily on legislative measures. The Government can control consumption, advertising and technical standards. Petrol is subject to a price moderator to encourage energy saving and conservation techniques have been included in driving tests. **IRELAND:** Subsidies on town gas are retained for social policy reasons, as many low income households use it as their main fuel. A mandatory insulation code exists on grant-aided new houses, which amount to about 60 per cent of private housing. It also applies to local authority buildings. Motorists face a car tax for engines over 2,000 cc, graduated according to engine size. **ITALY:** together with Japan, has the highest dependency on energy imports among IEA countries; which account for over 80 per cent of its needs. Petroleum fills more than half industry's requirements. There are plans for conversion and restructuring of plant and incentives for CHP. Progressive sales tax on cars based on engine size. **JAPAN:** Conservation policy relies mainly on market forces. Measures taken so far in the building sector "are not likely to have very much effect," says the IEA. There is a "Moonlight Project" for conservation in industry for which 2bn yen was budgeted in 1978. **HOLLAND's** conservation effort is "among the strongest in the IEA," says the IEA report. It runs a national insulation programme for all houses over a 12-13 year period, with a target of 300,000 dwellings a year. The average saving is expected to reach 10 per cent of domestic gas consumption. The Government is also considering the idea of EEC-wide fuel efficiency standards for vehicles. **SWITZERLAND:** Funds for fitting existing buildings have been discontinued and only a few cantons have an effective code stipulating thermal efficiencies for all new buildings. There are no Government funds for industry which has undertaken some initiatives by itself. Petrol taxes are still earmarked for road construction. **Maurice Samuelson**

Complete the International Energy Scene with...



Matthew Hall Engineering, Matthew Hall House, 101-108 Tottenham Court Road, London W1A 1BT
Tel: 01-636 3676. Telex 23764



The Microprocessor Optimiser

Experience from over 8,000 Honeywell optimiser installations since introducing the concept in 1970 confirms heating energy savings between 20% and 40% are available in intermittently occupied buildings. Features incorporated in this 2nd generation system further increase the energy savings potential.

- Optimum start programmes using self adapting software to match plant and building responses (up to 16 variable time channels)
- Optimised switch off of plant before end of occupancy using the same self adapting software concept.
- Programmable for up to 12 months including all holidays and weekend shutdown periods.
- Digital readout of programme values, temperatures and time.
- 72 hour power failure standby.

Honeywell offer a complete service to save energy in your building comprising: — survey, — installation, — commissioning, — after sales maintenance.

For further information complete the coupon below or contact Mike Inglis, Energy Management Group, Honeywell Control Systems Ltd., Commercial Division, Charles Square, Bracknell, Berks. RG12 1EB. Tel: Bracknell (0344) 24555.

Honeywell Energy Management Group
Please send further details
Please arrange for an engineer to call me
Name: _____
Company: _____
Position: _____
Address: _____
Tel: _____

Honeywell
The Energy Management Company

A watch on industry

ENERGY CONSERVATION promises to become an industry in its own right, shaped by modern technology on the anvil of ever-rising oil. This is the overall impression on this rapidly-growing field, which covers power for industry, space heating of buildings and cities, and research into alternative energy sources.

Yet it is not so much a new industry as the reawakening of an old one after 30 or 40 years of neglect during the age of cheap oil. Many basic concepts, such as heat recuperation or insulation, are not original. But they are being complemented or improved by new materials and technologies, which are spearheading the direct attack on wastage.

Of course, such a conservation industry will find its proper place only if society remains its master, rather than becomes its slave. It will have to stay subordinate to an increasingly confident school of energy management, which puts good housekeeping before extravagant investment in new gadgetry.

Yet this will not happen automatically, if one accepts the concern voiced by Mr. Andrew Buckley of Cambridge Information and Research Services, whose directory of energy saving equipment provides one of the first outlines of the industry in Britain. "I wonder if people who are appointed as energy managers have the authority to go to the people in their own companies who take the key decisions on energy policy," he said recently. "Too many companies are giving the job of energy manager to Joe Bloggs who is coming up to retirement. And yet success boils down to getting the message of conservation through to senior management."

Mr. Buckley's directory of energy-saving equipment, published for the first time last year, contains about 300 entries for British equipment in which established techniques jostle with the latest innovations. Two of the biggest categories are electrical controls and insulation materials, which were well established when the energy crisis arrived and therefore well placed to respond to it. But, in Mr. Buckley's opinion, the industry is now growing rapidly in other directions, too, with many very small companies trying to take the lead. The next edition of his directory is expected to contain 400 entries.

One of the chief fields for energy saving in industry is the recovery of heat used in processing and its re-use, either in more processes or in space heating of buildings. Combined heat and power (CHP) systems are designed for this very purpose. In electricity generation, only 30-40 per cent of the energy in the generating fuel comes out as electricity. But the efficiency can be boosted by combining both functions. Thus diesel generators can be used in a CHP scheme to produce electricity at 24 per cent efficiency and steam or hot water at 50 per cent, raising the total efficiency to 74 per cent.

In addition to CHP, there is a whole range of other heat recovery mechanisms, economisers, heat wheels, run-around-coils, heat pipes, recuperators and heat pumps. Economisers and air preheaters have been used for more than a century to improve the thermal efficiency of boilers.

Rotate

Heat (or thermal) wheels are used to transfer heat from a hot exhaust duct to an adjacent incoming air duct. As the wheel rotates it absorbs heat from the hot gas and transfers it to the cooler counter-flow. Berger, the paint manufacturer, has introduced a wheel into a new ventilation system at a factory near Newcastle Upon Tyne. Besides promising to save £3,000 in fuel bills over a year, it has improved working conditions in the resin shop by reducing the previous excessive air temperature to a more acceptable level.

A 10 ft wide heat wheel is part of a more efficient heating system installed in a bus depot by the Glasgow transport authorities. It cost about £5,000, but the company estimates a 35 per cent saving in the heating bill while at the same time improving working conditions.

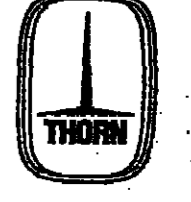
Simpler, although less efficient than the wheel is the run-

The life expectancy of a boiler is up to 25 years — during this time it will almost certainly be required to burn coal.

The Parkinson Cowan GWB multi fuel boiler will fire coal, waste, oil & gas and can quickly interchange to give benefit of cost and availability.

Your combustible waste could also provide all or part of your energy requirement.

Full details from:
Parkinson Cowan GWB Limited
P.O. Box 4
Burton Works
Dudley
West Midlands
DY3 2AD
Tel: Dudley 55455



CONTINUED ON NEXT PAGE

مكتبة الأصيل

INTERNATIONAL ENERGY MANAGEMENT V

Savings by companies

INDUSTRY currently accounts for some 40 per cent of the total energy consumed by the 19 member countries of the International Energy Agency, but by 1990 the proportion is expected to rise to 45 per cent.

Industry's energy use among IEA countries is forecast to grow at an annual rate of 4.5 per cent up to 1985 and then at 3.1 per cent a year until 1990. These predictions are correct.

Proportion

The chemical industry is a major energy user: not only does it need fuel to power its plants but it also uses gas and products—especially naphtha—raw materials. Within the European Community, chemical producers account for 1 per cent of the energy consumed by industry, plus an equivalent amount of naphtha and other feedstocks expressed in terms of energy content.

Yet figures from the European Council of Chemical Manufacturers' Association—CECMA—show that Common Market chemical companies are slowly reducing the amount of energy they use per tonne of product. An index with a base of 100 in 1970 shows that energy consumption per unit of chemical production fell to 0.888 in 1973 and has been dropping fairly steadily ever since.

In 1977 the index was at 0.844 and CECMA estimates that by 1982 it will have gone down to 0.800 before dropping again to 0.761 in 1987. European chemical companies in countries outside the EEC are expected to follow a similar downward trend in their consumption of energy per unit of production.

Yet despite the European chemical industry's attempts to make its use of energy more efficient, the proportion of money it spends on fuels has been rising steadily. It is estimated that in 1973 fuel—not feedstocks—accounted for 21 per cent of the industry's total costs. By 1978 this figure had gone up to 25 per cent.

Individual chemical companies have still managed to make substantial cash earnings as a result of their energy conservation programmes. The Shell group of European chemical companies reckons it has saved some £10m since 1975 simply by better housekeeping and maintenance and by improvements to its production processes.

The Shell chemicals group has also appointed a number of people to look specifically at ways of improving energy efficiency, and it says this has led to "an increase in the number of minor and occasionally major investment projects" which have an energy conservation element in them.

Constant and effective monitoring of energy consumption can also play an important part in the battle to use fuel and hydrocarbon feedstocks more efficiently. This point was stressed by another international chemical company, the UK-based Imperial Chemical Industries, at a seminar on energy saving in the chemical industry held in London earlier this year.

ICI noted dryly that opportunities for wasting fuel "abandoned" in petrochemical plants. It added that significant amounts of energy could be wasted without the effects being conspicuous. Traditional methods of energy accounting in continuously operating plants tended to operate on a weekly or monthly basis—too late for any but the most persistent causes of energy loss to be identified and corrected.

The energy efficiency of their production processes could not be much improved. But ICI had made "significant economies" by ensuring that plant managers had "timely and relevant energy performance figures" available.

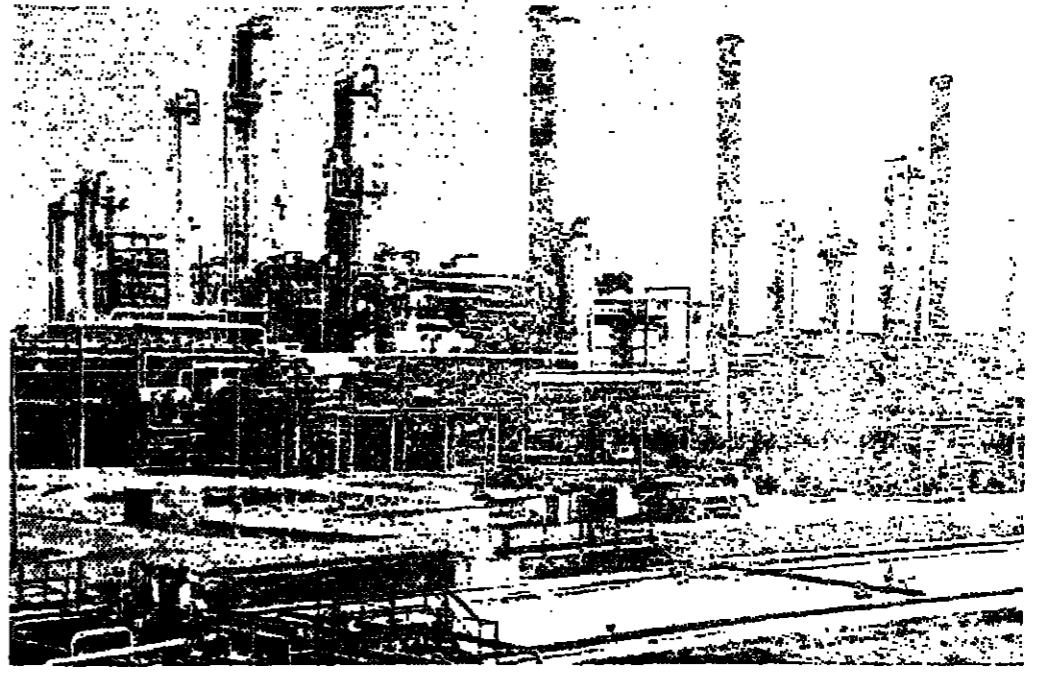
One of the problems now facing the chemical industry is that many of the more obvious energy savings—the ones that can be achieved through better housekeeping and minor modifications to plants—have already been made. Further improvements in the efficiency with which energy is used will require heavy investment in new plant and production processes. Results will take longer to show themselves.

A number of the major oil companies have committed substantial capital sums to energy conservation. One of the more unusual projects is being undertaken by Shell at its Gothenburg oil refinery in Sweden. The company claims that once the work at Gothenburg is completed in 1981 "no other refinery will be able to match us when it comes to energy saving."

at temperatures of between 150 and 200 degrees Centigrade—will be used to transfer hot water at 100 degrees C or more to the municipal grid and so into the central heating system. It will be taken through a deep tunnel, now under construction, that will pass beneath the Gota Alva river.

The project required a £5m investment in heat recovery and distribution facilities at the refinery itself plus another £5m in transfer lines, including the tunnel under the river. Profits from the venture are to be split between Gothenburg municipality and Shell on a 50-50 basis.

But Shell, like the major chemical companies, admits that future progress in energy conservation "will demand much greater investment than before." For example, one Shell refinery where considerable energy savings have already been made is at Pulau Bukom in Singapore; the group reckons that to achieve a further 25 per cent improvement in energy use there by 1985, it would have to double the present rate of investment, which is already running at between 3 per cent and 10 per cent of the refinery's total budget.



Low-level heat from Shell's Gothenburg oil refinery is to be used to supply about a third of the city's domestic heating

perhaps for this very reason they have been in the forefront of conservation programmes. But the potential for cutting consumption and improving energy efficiency in other industries is clearly considerable—as is illustrated by an IEA calendar published by the U.S. Department of Energy.

another in Staffordshire in the UK for brewers, a third in Amsterdam for the pulp and paper industry; in Tokyo there is to be a conference on the utilisation of urban waste heat and in London there will be another on the rational use of energy in buildings.

Yet despite the growing awareness of the need to save energy and the efforts of individual industries and companies, the IEA can still claim that "in industry only limited efforts have been made to date in assessing energy conservation potential."

Sue Cameron

Industry

CONTINUED FROM PREVIOUS PAGE

ound coil. Two heat exchangers, usually multi-rowed coils, are linked by a pumped water or water/glycol anti-freeze) circuit. It uses pipework rather than duct work and as finned coils are not the best way of transferring heat, they have efficiencies of only 10-35 per cent. But because they can transfer heat between supply and exhaust ducts some distance apart they are perhaps the only method which can be applied to existing ducting systems.

Plate heat exchangers look like old-style ribbed radiators compressed into thin plates, joined together to form thin passages. Hot exhaust fluid passes one way and incoming supply the other way, through parallel alternate plates. Used to extract heat from waste water and various kinds of exhaust, they can recover between 60 and 80 per cent of the waste heat available when operating with air or gases, and up to 90 per cent when operating with liquid. Applications include recovery of heat from boiler gases, dye effluents, caustic soda processing and whisky processing.

Cheaper

Mothercare reckons that an air-to-air heat pump will be 6.5 per cent cheaper per square metre than a central plant gas boiler, for a retail outlet of 200 square metres. Because the pump is usually put on the roof, a plant room is not needed. Electrical air conditioning is 21 per cent cheaper, but the running costs per square metre are nearly double those of a pump.

Services Agency, responsible for Britain's public buildings, has reduced energy use by about 30 per cent compared with 1973-75 by using optimum start control systems. These are designed for use in intermittently occupied buildings and their function is to switch on heating according to weather conditions outside and to ensure that the required space temperature coincides with the commencement of work. At weekends, when the building is shut, the optimiser recognises the loss of fabric heat and provides an earlier start on a Monday morning.

Precedence

Honeywell, which has installed 8,000 optimisers since 1970, says that heating energy savings of 20-40 per cent can be gained in intermittently occupied buildings. Landis and Gyr is a British company in the forefront of control technology. (It has won a contract to maintain the controls on 700 public buildings in the UK extending from The Wash to the Welsh border.)

It is a moot point whether use of optimisers should take precedence over insulating a building against unnecessary heat loss. Eurisol-UK, the organisation representing five British mineral fibre manufacturers, estimates that there are 9.45m square metres of industrial roof area in Britain. If insulated according to its recommendations, heat loss would be cut by 40 per cent, saving 31,000-40,000 tons of oil a year. Another 18,900 tons could be saved by insulating the 6.6 square metres of industrial wall.

There are various ways of insulating pitched roofs—by installing a false ceiling or spraying insulation material on the underside of the roof. Cavity walls can be filled with a wide range of foams or fibres, while solid or single-skin walls can be given lightweight insulation panels on the inside or cladding on the outside.

Mineral fibre is made from rock or glass and comes either in blocks or fine particles which can be blown into cavities. Polyurethane, which is lighter but has sometimes been criticised as a fire risk, may take a larger slice of the market because of its cost. At present, it is believed to have a 20 per cent market share.

However, as this article stated initially, it is management and maintenance which are the starting point in the attack on fuel wastage. A sobering example of this is the wastage which occurs from failing to ensure that boilers are fed with properly treated water to keep them free of scaling.

Energy conservation is a profitable business. Large stylized text advertisement with a cartoon character of a lightbulb.

Energy conservation makes sound financial sense—because obviously the less energy you waste the more money you save. As fuel costs will undoubtedly continue to rise this will continue to make sense. Britain has a lot of natural gas in the North Sea and elsewhere around our coasts but gas, like any form of energy, or indeed any valuable commodity, needs to be used wisely.

The British Gas School of Fuel Management. This unique facility has helped train thousands of managers from industry, commerce and local authorities to save fuel. Gas Energy Management Awards. Energy Advice Centre. Energy Conservation Makes Sense.



INTERNATIONAL ENERGY MANAGEMENT VI

A need to adapt to oil price rises

MOST INDUSTRIES recognise that a key factor in their survival, let alone their expansion, is how they adapt to the rising price of oil.

The heavy industries—iron and steel, glass, cement and chemicals—account for about 20 per cent of total industrial output but, according to a recent estimate by Shell, consume more than 50 per cent of energy used by industry. Other prodigious users of energy—especially oil—are transport and buildings.

Transport accounts for 20 per cent of oil consumption in Japan, 27 per cent in Western Europe, and 60 per cent in the U.S., where private transport is a major consumer. Fuel also accounts for about 30 per cent of total costs of freight transport.

The potential savings of industry are hard to define. But according to the Department of Energy's "Energy Paper 32," 30 per cent—or 100m tons of coal equivalent (MTC)—of the present rate of consumption by UK industry could be saved by technological changes.

It reached its conclusions on the basis of some of the audits which have been carried out into energy-intensive industries. Yet few of these industries needed to take their cue from the Government before seeking to reduce their fuel bills.

British Steel, which spends more than £300 a year on coking coal for its furnaces, has three main courses of action to achieve savings. It has commissioned bigger and more efficient blast furnaces, such as the 5,000-ton-a-day strip mill at Llanwern, South Wales, and the 10,000-ton-a-day giant at Tees-side.

Methods

Other methods of boosting efficiency are to inject oil into blast furnaces and the use of preheating plants for coke-

making of some works. This removes the moisture from the coke and obtains better performance from the blast furnace. BSC is also studying alternative blends of coal to yield better results. This is apart from the adoption of conservation methods, such as heat recycling, popular throughout industry as a whole.

In the transport sector, the attack on petrol usage is being made from many different directions at the same time. In the U.S., legislation has been introduced to force car manufacturers to produce less thirsty vehicles. In Europe, voluntary agreements between Government and car manufacturers have been concluded. The West German industry has undertaken to try to cut 10 to 12 per cent from fuel consumption of the cars it produces and to achieve 5 per cent by the mid-1980s.

In Britain, the Society of Motor Manufacturers and Traders (SMMT) entered a voluntary scheme in the summer whereby car makers would try to achieve an overall 10 per cent improvement in petrol usage by 1985. At Government level, consideration is still being given to scrapping the road tax charge and transferring it to petrol pump prices. The rules are also being slightly relaxed which previously prohibited motorists from taking passengers who contributed to the cost of a journey.

Britain's Transport and Road Research Laboratory has claimed that better driving techniques can save petrol by up to 20 per cent. Several other countries now make efficient driving part of their qualification tests. Another practice is to tax the car according to engine capacity.

The Transport and Road Laboratory has also claimed that heavy lorries could save 25 per cent of their fuel by better use of capacity and improved loading, and by a change from cross-

ply to radial and other tyres. The average cost of fuel and oil is about 17 per cent of the overall total and something like 28 per cent of a road haulier's running costs.

Other lessons of which hauliers are being frequently reminded are to watch tyre pressures and look out for fuel spillage and badly-running engines. Some contractors are also turning to thermostatically-controlled cooling fans which keep diesel engines at the right temperature. These are said to have cut consumption of diesel by 10 per cent. A growing number of lorries can also be seen carrying wind deflectors.

Better planning of journeys is another high priority, in view of estimates that more than 30 per cent of lorries run empty. The British Road Haulage Association is encouraging the formation of freight exchange centres and reciprocal loading arrangements among its members. The association is also pressing for greater vehicle weights to be allowed on British roads, comparable with those on the Continent.

It claims that by raising the gross laden weight of an articulated vehicle to 40 tons, it could carry at least six more tons of cargo. With an extra axle on the tractor this would not raise the average imposed weight on the roads. Instead of having four axles carrying 32 gross tons, as at present, there would be five axles carrying 40 tons.

The potential savings in the building sector are also large, but the problems differ markedly from those in transport. A building's fabric can last for 60 years and the heating and ventilation systems have a life of about 20 years. The bigger the building, the bigger are potential losses and savings. In hospitals of the British National Health Service energy consumption amounts to 2m tons of coal equivalent a year, costing about £130m a year.

Since 1973-75, energy consumption in hospitals has been cut by about 18 per cent, and cuts of a further 15 per cent are being sought over the next decade. This is being achieved by insulation, lower temperature levels, and installation of cheaper heating and power systems.

Much of the information about energy use in British industries has been gained from the studies of individual sectors sponsored by the Departments of Industry and Energy, either jointly or separately. In these audits and "thrift" schemes, Britain is giving a lead to many other industrial nations.

The report on the British textile industry, carried out under the Industry Department's Thrift scheme, revealed scope for savings of 15 per cent to 19 per cent, worth at least £20m a year. Energy is wasted because of inefficient space heating and air conditioning, which fail to prevent loss of heat through roofs, windows and loading bays.

In nearly half the sites visited for the spinning survey, ineffi-

ENERGY USE AND PROJECTED ENERGY DEMAND IN INDUSTRY*

	Million tonnes of oil equivalent					Annual Growth (%)†				Share of total final energy consumption %
	1960	1973	1977*	1985	1990	1960-73	1973-77	1977-85	1985-90	
Austria	4.32	8.77	7.44	9.9	10.0	5.6	-4.0	3.5	3.2	49
Belgium	8.73	19.27	16.16	21.8	24.9	6.3	-2.7	4.3	2.7	31
Canada	24.32	46.05	49.81	73.8	82.7	5.0	-2.7	2.5	3.0	22
Denmark	3.11	4.08	3.66	4.4	5.1	2.2	-0.9	3.1	1.7	42
Germany	51.75	92.23	78.42	105.4	114.9	4.3	-2.0	3.1	4.3	42
Greece	0.84	3.70	4.03	7.2	8.4	5.9	5.0	15.7	5.9	38
Ireland	0.73	1.53	1.86	4.3	6.4	7.9	0.4	3.6	6.1	46
Italy	18.42	49.29	50.09	64.3	75.0	10.3	2.0	6.3	3.6	56
Japan	36.22	137.74	149.21	228.1	271.9	2.5	-6.4	2.4	1.5	69
Luxembourg	0.33	3.22	2.47	3.0	3.3	10.3	1.2	5.1	2.2	42
Netherlands	1.20	1.89	2.40	3.9	4.8	3.6	6.1	4.7	4.3	39
New Zealand	2.24	7.12	8.86	9.3	10.6	6.2	-0.9	5.4	2.7	43
Norway	5.85	24.6	25.26	34.7	41.7	11.7	8.6	3.2	3.7	54
Sweden	9.93	16.72	14.92	19.2	20.6	4.1	-2.8	3.8	1.4	42
Switzerland	2.60	4.80	4.24	5.0	5.7	4.8	-3.0	0.2	3.6	39
Turkey	1.10	4.14	6.04	23.2	33.6	10.7	9.9	18.4	7.7	23
United Kingdom	55.00	69.67	60.46	81.0	92.0	1.8	-3.5	2.9	2.6	43
United States	309.80	467.47	429.84	591.2	719.2	3.2	-1.2	4.5	3.5	33
IEA Total	544.61	984.10	936.00	1,321.4	1,568.4	4.3	-1.2	4.5	3.5	38

* Including non-energy uses.

† Based on Energy Balances of OECD Countries.

‡ Historical estimates are based on Energy Balances of OECD countries projections are based on country submissions for 1978 Review of National Programmes.

Sources: Energy Balances of OECD Countries and IEA 1978 Review of National Programmes.

cient boilers needed to be replaced and better standards of insulation of mains and pipes delivering steam and hot water was required. A study of the woollen industry showed that most companies were failing to recover valuable heat used to warm dye liquors. In the Lancashire cotton industry, on the other hand, simple heat exchangers developed for textile mills could save 13 per cent of their energy, cutting costs by £32m a year. Even though the industry, which uses large

A £100,000 research project is being carried out at the Shirley Institute, to study recovery of the exhaust heat used in various processing stages. It is supported by a 50 per cent grant from the EEC and 25 per cent from the Industry Department.

Another Thrift Scheme report, published this year, concluded that Britain's paper and board mills could save 13 per cent of their energy, cutting costs by £32m a year. Even though the industry, which uses large

amounts of energy and water, closely watches its costs, about a third of the 68 mills inspected had not taken significant action to save energy.

Opportunities were identified in steam-raising plant, since many of the boilers were over 50 years old and had been converted to burn fuels for which they were not designed.

Reports

The paper industry was the first in the UK to make extensive use of combined heat and power schemes (CHP). However, the report added, few had been able to afford to renew their power plant in the last 20 years or so.

The British glass and aluminium industries were the subjects of Energy Audit reports issued jointly in July by the Departments of Industry and Energy. The glass industry uses more than 2 per cent of the total energy used by the UK's main industrial groups. The survey showed that 20 per cent more insulation could provide an overall fuel saving of 6 per cent. The report on the aluminium industry—which consumes about 2.5 per cent of UK industry's total fuel demand—said that better use of recovered waste oil could save £2m a year out of a fuel bill of £150m. Better housekeeping could produce savings of 4,100 tetra-joules a year.

Industry is not simply a consumer of energy, however. A large majority of establishments (193) had some form of combined heat and power recovery plant. The industries with most private generation plant were chemicals, oil refineries, iron and steel and paper and printing, which accounted for two-thirds of both capacity and electricity generated.

The extent of CHP in industry in Britain underscores the current interest in extending it to public power stations, which would provide steam heat, as well as electricity, to major cities.

Following the publication of the Marshall Report in the summer, the Government is now studying the recommendation that one or more city pilot schemes should be launched as soon as practicable and a National Heat Board established to bring this about. Since then, at least one important city has expressed an interest in being selected for this pioneering experiment in Britain.

British Government report published in July, showed that about 24 per cent of electrical consumption in 1977 by the industry, transport and public administration sectors were accounted for by 235 establishments which generate at least part of their own requirements. Their electricity generation was equivalent to 60 per cent of their own consumption, or 1 per cent of the consumption of these sectors as a whole.

A large majority of establishments (193) had some form of combined heat and power recovery plant. The industries with most private generation plant were chemicals, oil refineries, iron and steel and paper and printing, which accounted for two-thirds of both capacity and electricity generated.

The extent of CHP in industry in Britain underscores the current interest in extending it to public power stations, which would provide steam heat, as well as electricity, to major cities.

Following the publication of the Marshall Report in the summer, the Government is now studying the recommendation that one or more city pilot schemes should be launched as soon as practicable and a National Heat Board established to bring this about. Since then, at least one important city has expressed an interest in being selected for this pioneering experiment in Britain.

Maurice Samuelson

Energy managers need more clout

A GOVERNMENT Green Paper in 1978 predicted that energy costs would double in real terms by the year 2000. Such a daunting outlook no doubt prompted a great many companies to look more closely at their total energy consumption and to consider ways in which they might sensibly reduce the level.

A warning such as this generally galvanises companies into taking some energy conservation action. It happened after the 1973-74 Middle East crisis and it is happening now following this year's supply problems, particularly in the wake of the revolution in Iran.

Very often the immediate action taken by companies is to turn down their central heating, delay time at which they turn it on in the winter or, in the summer, make less use of air-conditioning plant. At the same time, they may well appoint an energy manager to assess how a more across-the-board reduction in energy consumption can be effected.

Today, the Department of Energy is aware of the existence of nearly 4,000 energy managers in industry, local and public authorities and Government. Though it seems that a good many of them have been

appointed since the 1973-74 crisis, many of the larger companies have had people responsible for keeping a tight rein on energy consumption for many years before that.

Though the total number may not seem very large in comparison with the hundreds of thousands of companies that exist in the UK, the probability is that there are a great many more people in industry who have some form of energy responsibility but who have no particular title. This is particularly so in the case of medium and smaller-sized companies which might well make energy monitoring a minor task for one of their engineers.

Generally speaking, then, the role of energy manager is a very new one, and because of this the status of the job remains undetermined. And this can cause problems, for if it carries little weight within a company the chances are that the potential for energy savings will remain unrealised.

Mr. Robin Gardiner, the Department of Energy's regional energy conservation officer for the North-West region, adamant that companies should "give energy managers teeth in their managerial responsibility."

If such an appointment is made, then management must use the manager since he will be looking at areas where individual savings of more than 50 per cent, and a general level of saving of around 30 per cent is quite possible, says Mr. Gardiner.

The energy manager, he believes, should have sufficient senior status that he has direct access to those who will either ratify or reject his recommendations—generally speaking, this means the company Board. He must also have access to all information on the company's energy bills so that he knows his starting point.

Priority

By having a clear picture of expenditure on oil, gas and electricity an energy manager can begin to establish the areas in which savings can be achieved and in what order of priority.

Sensible and straightforward though such a step seems to be, it is not without its problems, according to some energy managers. As is often the case when a new job is implanted within a management hierarchy, objections may well be raised about releasing hitherto confidential financial data to someone whose new job is not fully understood throughout the company and whose previous job within it—possibly as an engineer—did not warrant access to such information.

Similarly, difficulties in establishing a proper working relationship with other parts of a company can arise if the calibre of the job remains unclear. For example, in a manufacturing company economies on the production lines will almost certainly exist, but unless the energy manager's role is recognised and accepted by the production managers it is unlikely that more than just the mere obvious savings will be made.

This is an important point, according to energy managers, for the job of energy conservation is much more than a matter of merely switching off lights and turning down the thermostats. Over and above the question of energy saving is energy efficiency, which is much more likely to involve a company in having to invest money before it achieves any

As well as status, a big question surrounding energy managers is what their qualifications should be. Here, there seems to be general agreement among such managers themselves that they should have some technical expertise. But as one energy manager puts it, it should really be a matter of "horses for courses."

Generally, an engineering background is considered ideal with, for instance, an electrical engineer taking on responsibility for assessing where savings in electricity consumption can be achieved. But that is not quite all, for while it is one thing to identify savings it is another to get acceptance for them to be implemented. Therefore, many believe that energy managers should be given some form of financial training so that they can put forward their ideas in a way that financial management, and particularly accountants can understand. This is a key point in relation to fuel efficiency programmes requiring investment in new equipment and plant where the return is unlikely to be seen in the short term.

In tandem with the growth in the number of energy managers has been an expansion in the numbers of Energy Managers Groups set up under a Department of Energy initiative. These groups, which the department claims are a unique idea unknown in any other country, are designed to bring energy managers together in different regions so that they can exchange ideas and listen to talks given by experts in different areas of the energy field.

This also enables the managers to keep right up to date with Department of Energy thinking and policy. There are now nearly 70 such groups around the country, some of which have more than 60 members. They meet once every one or two months.

According to Mr. Gardiner, who has been involved in setting up seven such groups in the North West region, the membership largely represents the bigger companies. It is a situation he hopes to change, because he feels that unless the smaller and medium-sized companies come to recognise the need for energy saving, they will be hit much more heavily than large companies as economies become more imperative because they will be unprepared.

Nicholas Leslie



Traffic in Park Lane, London. Better driving techniques are reckoned to make savings of up to 20 per cent in petrol consumption

FREE FUEL FROM

Combustible Waste

Recover the Energy

Fill Fuel Shortfall

Save Disposal Costs

Prevent Pollution



Steam generation plant using general industrial waste as a fuel

Beverly Chemical Engineering Ltd.
Billingshurst, West Sussex, RH14 9SA.
Tel: (040381) 2091 Telex: 87416

Incineration equipment for large and small systems is available for all types of waste—solid, liquid, gaseous—with or without high efficiency heat recovery and meeting all environmental standards

FOR ENERGY MANAGERS WHO NEED TO KNOW

Publications and services designed to meet the international business community's need for fast, accurate intelligence about ENERGY supply, consumption and politics.

- OILGRAM NEWS SERVICE
- OILGRAM PRICE SERVICE
- Platts OILGRAM MARKETSCANS
- Platts OILGRAM NEWS/WIRE
- Platts Marine Fuel BUNKERWIRE
- Platts PETROCHEMICAL SCAN
- COAL WEEK

For full details and sample copies contact
Brian Shelley 34 Dover Street London W1X 3RA England
Telephone 01 493 1451 Telex 23706 MCGRAWHILL LONDON
Annette LaTorre 1221 Avenue of the Americas/43rd Floor New York NY10020
Telephone 212 997 6220 Telex I2 7960 MCGRAW NYK

INTERNATIONAL ENERGY MANAGEMENT VII

Conflicting interests double U.S. oil bill

THE U.S. has come a long way since President Nixon launched Project Independence to end America's need to import oil by 1980—but a long way in the wrong direction. In Mr. Nixon's day, the U.S. imported about 4m barrels of oil a day. Today, it imports more than twice that much. What has gone wrong?

It would be easy to accuse the U.S. of grossly mismanaging its energy problems. But while many Europeans frequently do that with a touch of smugness, such an attitude fails to take into account the enormous complexity of the U.S. economy, the conflicting interests over energy (between producing and consuming states, for example), and the endless political rivalry that goes on in Washington between Congress and the White House.

If all this is taken into account, the U.S. has not done badly at all, particularly under President Carter who has used his executive authority to the full to tackle such matters as energy pricing which lie at the heart of the whole energy problem. The U.S. is now striving to reduce dependence on oil, to bid back the growth of imports, develop new fuels and rationalise transport.

Much of this is still in the letting pot, though, and it is still far from certain that the U.S. will have a proper energy management policy by the time next year's elections paralyse the political process once more. Historically, America has been fortunate with energy. This basic resource has been cheap and abundant and when it became expensive it was scarce elsewhere the Government was able to take steps to keep supplies up and prices down at home.

Until the beginning of this year, the country was largely insulated from trends on the world market. Regulations freezing the price of most domestically-produced oil enabled Americans to keep driving their 8 mpg cars while their wives used electrically-driven four sisters in their kitchens. However, apart from adding to the envy and ire of other advanced countries, this state of affairs was also undermining the value of the dollar by stimulating vast oil imports.

Sensible

President Carter had earlier tried to put together a coherent energy policy that would have brought prices closer to world levels and encouraged Americans to consume cheaper and more sensible fuels like coal. However, his ill-fated 1977 Energy Bill encountered every conceivable opposition in Congress. Consumers did not want prices to go up, producers said they should go up more than Mr. Carter proposed. Industry wanted to produce more coal, environmentalists said no, and so on.

But the tattered Bill which finally emerged last autumn contained at least one important measure: the de-regulation of natural gas prices. Although the means by which this will be accomplished are very complex (and in some cases they actually strengthen rather than reduce Government control), the measure was a prelude to Mr. Carter's second important step, the de-regulation of oil prices.

Despite the inflationary implications at a time when prices were rising at over 10 per cent

a year, Mr. Carter used the authority granted him under earlier oil legislation to phase out oil price controls between last June and September 1981, by which time they should be close to world levels.

However, he attached to this move a proposal to tax a large part of the windfall profits that the oil industry is bound to make as a result of de-regulation. Whether he did this out of ideological zeal or as a sop to get de-regulation through, the tax has turned out to be far more controversial than de-regulation itself.

Exceptions

Mr. Carter originally asked Congress to pass a 50 per cent tax, with some exceptions, the main one being Alaskan oil because of the high cost of developing it. However, the House of Representatives increased this to 60 per cent and threw in Alaskan oil for good measure.

The Bill then went to the Senate which is still deliberating it, but which is expected to take a more pro-oil industry view than the House and reduce the tax bite. The final House-Senate compromise may therefore turn out to be close to what Mr. Carter wanted in the first place. Attention will then turn to what use should be made of the windfall profits tax revenue.

Mr. Carter has proposed a special energy security corporation with \$88bn to spend over the next ten years to stimulate development of alternative fuels, such as synthetic oil and gas from coal. A separate agency will promote solar power, a wide category which includes wind, tides and even hydro-electricity.

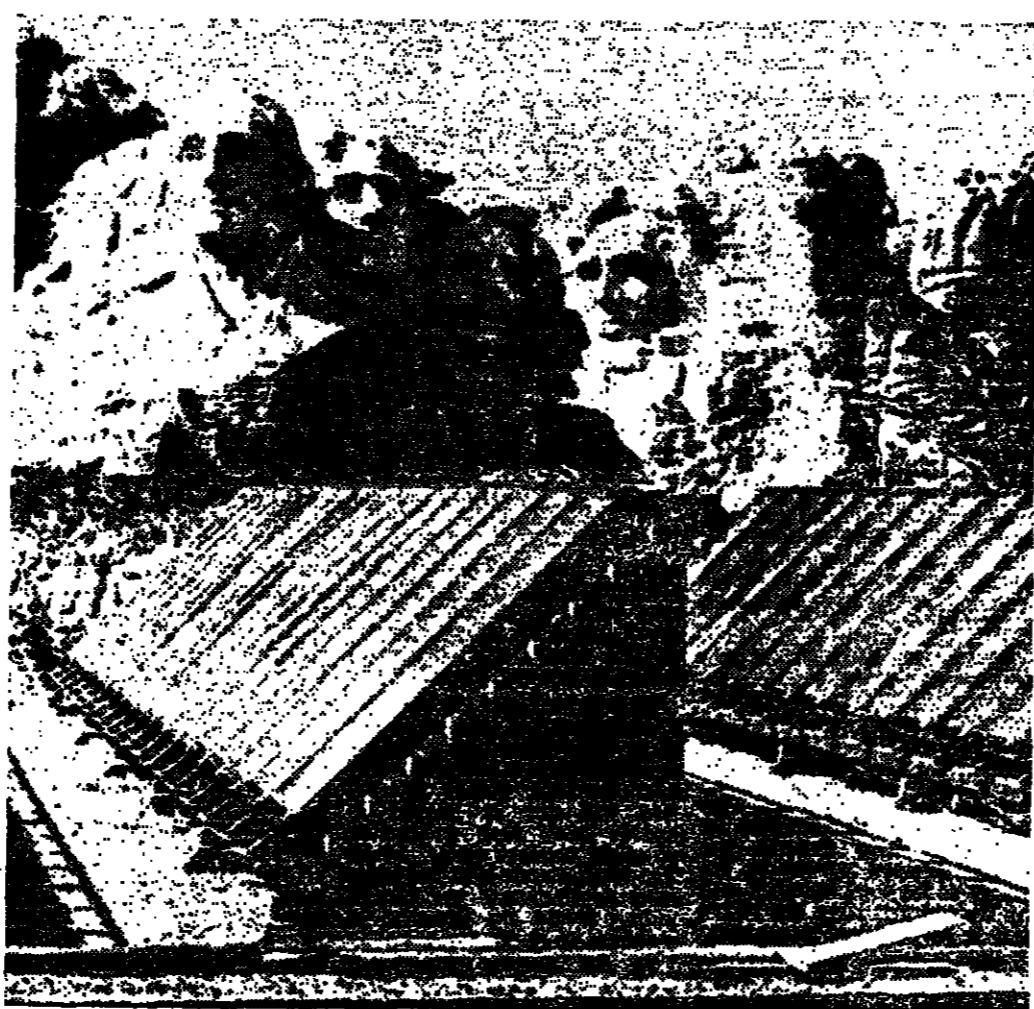
Parallel to this, Mr. Carter wants an energy mobilisation board or "fast track agency" whose job it will be to sort out energy priorities and push urgent projects through the regulatory process. Not surprisingly, environmentalists have reacted with alarm to this proposal since, as one of them puts it, it could end up with a dam being built in the Grand Canyon as a "national priority".

However, with the huge amount of Government regulation now a major factor in energy development, the fate of the energy mobilisation board proposal could well be a test of how urgent the energy problem is considered to be by the U.S. public and Congress.

The one major energy area where there are still no firm proposals is nuclear power, for obvious reasons. The Three Mile Island accident sparked strong anti-nuclear feelings, and it would take a bold Government to come out with a strong commitment to the atom just now. The public also has reservations about coal, even though this is the U.S.'s largest single energy source. There is currently a lot of spare capacity in the country's coal industry, and the Administration would dearly like to exploit it more fully, both for burning in power generation and for processing into more readily transportable and consumable forms.

However, there is also strong environmental opposition to coal, both because it messes up the landscape and because it is dirty to burn. And until new technology such as liquefaction or gasification is mastered on a large scale, its prospects must be deemed modest.

But perhaps the greatest single contribution to the



Rising heating oil prices have resulted in an increasing use of solar power in the United States. Here, solar collectors provide about half the energy needed for heating and air-conditioning the visitors' centre at Mount Rushmore National Park

energy problem will be made by what a recent study described as the source which produces no radio active waste, no pollution and no petro-dollars: conservation. That study, by the Harvard Business School, concluded that a serious commitment to energy conservation could reduce U.S. energy consumption by 30 to 40 per cent without affecting the standard of living.

In fact, more progress than is often realised has already been made in conservation. The growth of energy consumption in the U.S. has been slower in recent years than in Europe, thanks to measures taken after the Arab oil embargo. The rapid switch to smaller cars in the next two or three years ensures that this trend will continue, as do incentives to insulate homes.

The biggest jolt, though, will come from the sharp rise in petrol and heating oil prices which are just beginning to bite. With the petrol price already up nearly 50 per cent since Mr. Carter began oil price de-regulation, and heating oil likely to cost nearly twice as much this winter as it did last, the American consumer is already driving far less, and turning his thermostats down. Similarly, in industry, there are many examples of dramatic fuel savings in establishments that put their minds to it.

The prospects of the U.S. meeting its June Tokyo summit commitment to hold oil imports at 1977's 8.5m barrels a day level are therefore held to be good. But some tough decisions will have to be made soon on such questions as nuclear power and coal development if a satisfactory energy balance is to be maintained in the long term.

David Lascelles

Japan switches energy sources

JAPAN'S MAIN target in the energy field is to reduce its oil imports from 75 per cent of the country's total energy consumption today to 30 per cent by 1990. To achieve this the government hopes to develop production and consumption of four alternative types of energy—steam coal, nuclear power, LNG and LPG.

Coal imports, which at present amount to about 1m tons a year, are to be raised to over 50m tons by the mid-1980s. Nuclear power generation, it is hoped, will rise from 10m kW today to 30m kW in 1985 and 53m kW in 1990. Consumption of LNG is scheduled to reach 29m tons in 1985 and 45m tons in 1990.

Conversion to these energy sources is likely to be costly—the total investment involved in the government side alone could reach 4,000bn yen (nearly \$15bn) and to cover these costs the government is likely to have to introduce new taxes on fuel consumption, as well as converting the use of existing fuel tax revenues from road building to energy diversification.

Finance is not the only problem that has to be solved in order to implement energy diversification targets. In the

case of nuclear energy much depends on the speed at which sites for new power stations can be approved in an environmentally conscious nation. Environmental problems may also arise with the switch to coal-powered electric power generation that is implied by the programme, but Japan hopes to solve such problems provided adequate financing is available.

Two other objectives of Japan's energy programme are: to develop indigenous oil resources and to economise on energy consumption. Oil prospecting around Japan's coasts and in the continental shelf area between Japan and Korea is now under way and the chances of finding oil in part of this area are thought to be good.

However, production from fields which may be discovered near Japan is likely to take at least ten years to develop commercially. Therefore the local oil search has little relevance to energy supply prospects in the period up to 1990.

Energy conservation in Japan is conducted under a voluntary programme drawn up by the government (although the Ministry of International Trade and Industry has reserve powers

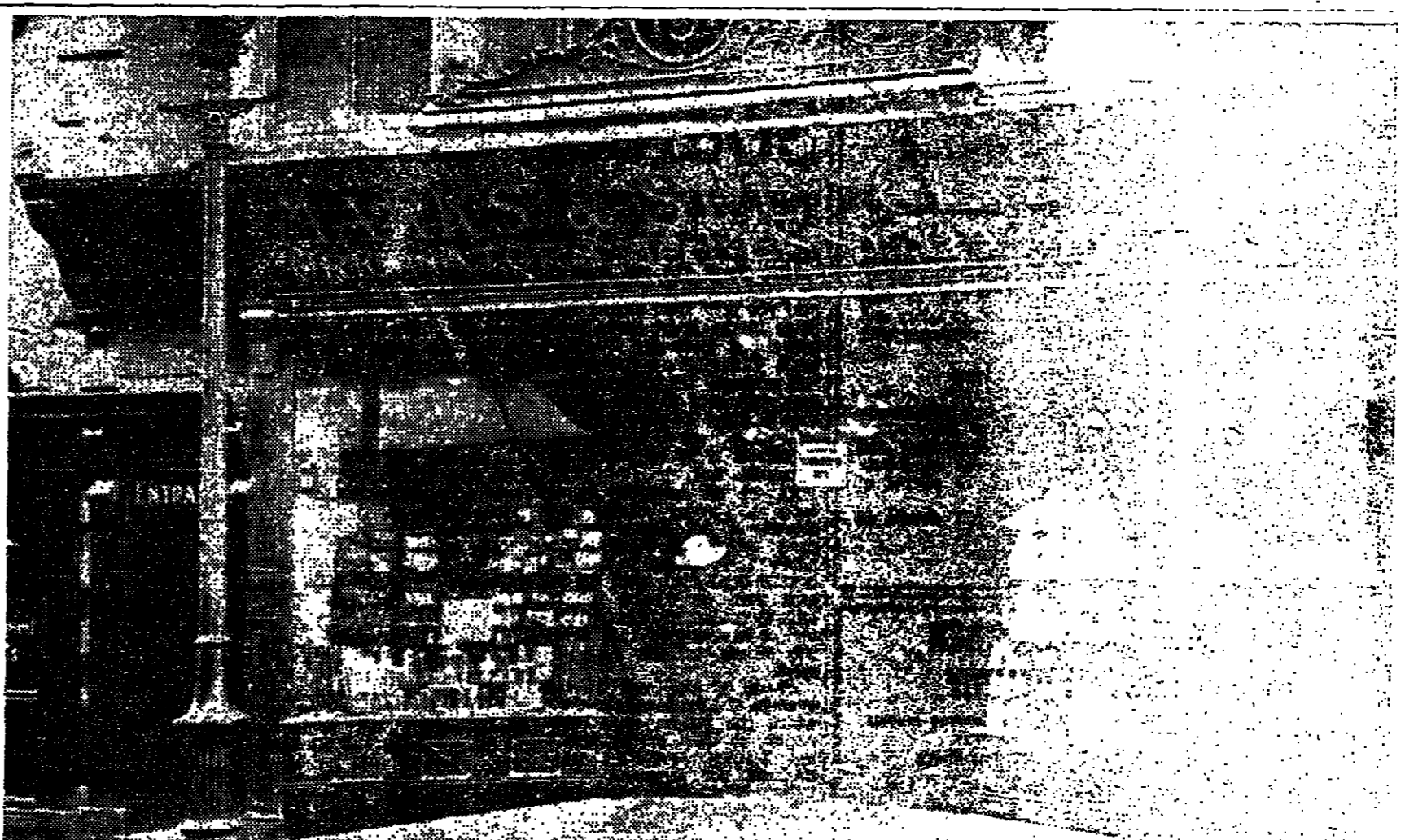
to introduce rationing).

Measures which affect the individual include the Sunday closure of petrol stations (under government "guidance") and the reduced use of air conditioning in offices and government buildings since early this year. Room temperatures will be set at slightly lower temperatures this winter (a maximum of 19 deg. Centigrade is the recommended figure) and private homes may use less kerosene following a decision by MITI to decontrol prices of this basic home heating fuel.

In industry (where the bulk of Japan's energy consumption occurs) conservation programmes have been under way for the past several years and appear to be yielding good results. Industries which have reduced their energy consumption substantially per unit of output since the 1973 oil crisis include steel and motors.

Despite the emphasis being placed on diversification and conservation, Japan still expects to increase its oil imports during the next few years, but at a much slower pace than might otherwise have been the case. The target for oil imports in 1985 is 6.5m barrels per day

CONTINUED ON NEXT PAGE



THEY DIDN'T GET WHERE THEY ARE TODAY BY IGNORING THEIR ENERGY BILL.

In the twelve months ending December 1978, the 252 Marks & Spencer stores rang up energy savings worth £2½ million – or two per cent of the company's pre-tax profits.

During the five years from 1974–1978 the company's total energy savings amounted to £8.2 million – all for a capital investment of £1¼ million.

Marks & Spencer's economies resulted from their far reaching study of lighting, new technology like solar heating, and the recovery of waste heat from refrigeration plant. Could you benefit from their example?

Most small to medium-sized firms could save an average of 10–15% of the cost of heating, power and lighting.

How to make these savings? You should start by sending off the coupon for details of our Energy Survey Scheme.

Under this scheme you can ask an

independent consultant to give your firm a one-day energy survey.

He'll give your whole factory an energy once-over and will recommend energy-saving measures.

Invest in energy saving. And as Marks & Spencer found, the returns could mount up in a big way.

Energy saving problems or questions? Phone the Energy Quick Advice Service for immediate free advice.

Industrial queries – Freephone 6227 (England & Wales) – Freephone 8315 (Scotland).

Building services queries – Freephone 3140.

To: Dept. of Energy, Energy Survey Scheme, P.O. Box 702, London SW 20 8SZ. Please send me details of (tick box):

Energy Survey Scheme.

Energy Management – monthly newspaper.

Technical films, booklets and leaflets.

Name _____

Company _____

Address _____

DEPARTMENT OF ENERGY FT1

MAKE THE MOST OF ENERGY

INTERNATIONAL ENERGY MANAGEMENT VIII

Europe trims its growth forecasts

THE CUT-OFF in oil supplies from Iran earlier this year and the steep rise in OPEC prices which followed it have had, so far at least, a less devastating impact on Western European economies than the first export embargo and four-fold price increases in 1973-74.

Though the latest supply problems have led to trimmed-down growth forecasts and an aggravation of inflationary pressures, the EEC as a whole is still expected to achieve real economic growth of about 3 per cent this year and next. That is in spite of the widespread adoption of tight monetary policies and the deliberate decision by most governments to allow higher energy prices to flow directly to consumers.

Yet the nine Common Market countries have also managed to mount a more convincing display of co-operation in confronting the latest threat to their oil supplies than they did five years ago. For the first time, in conjunction with the U.S. and Japan, they have committed themselves formally to trying to stabilise the level of their combined annual imports over the medium-term. The Nine aim to keep their total imports at or below the 47m tonnes which they imported last year.

The decision was finalised only with some difficulty. Though the overall EEC target was established at the European Summit in Strasbourg last July, the smaller EEC countries were resentful at not being consulted

at the Tokyo world summit later that month, at which Britain, France, Germany and Italy agreed to urge their Community partners to agree to national limits as well.

The process of distributing the overall limit internally between the Nine has taken a full two months to achieve. Initially, each country sought the highest possible national "quota", arguing in turn that it needed a higher ceiling than in 1978 to allow for future economic growth. In the end, Germany, Italy, the Netherlands, Belgium and Ireland were, for different reasons and in different degrees, allocated more than their 1978 imports. That was made possible by restraint on the part of France and Denmark and by Britain's expectations that rising North Sea oil production would turn it into a modest net exporter over the six years.

The practical value of the exercise is open to question. The figures are based on a perhaps optimistic assumption that the EEC's economic growth rate will average 3.8 per cent a year during the period. But economic forecasters have difficulty these days peering even six months ahead, and few would chance their arm on a prediction stretching to 1985.

Moreover, no sanctions are envisaged to ensure that the limits are respected. But it is hoped, none the less, that the commitments will provide a goal, from which countries will not deviate too far for fear of

international recrimination, and that the oil producers will be persuaded that the EEC is taking its responsibilities seriously.

The second main thrust of the Community's efforts since the Iran crisis has been towards shedding more light on the operation of the oil market. French demands for direct control of the Rotterdam "spot" market have been headed off in favour of a proposal to establish an official register of all oil imports entering the EEC. Though the idea has been endorsed in principle by the Council of Ministers, full agreement on its detailed implementation has still to be achieved.

Arrangements

The main points still at issue are how much information should be sought on import shipments, how it should be handled and what arrangements should be made to safeguard its confidentiality. Both Britain and Germany have insisted, too, that the system must be part of a wider effort embracing the U.S. and other major oil importers to build up a clearer picture of the market. The Nine are also exploring the possibility of setting up an oil exchange, on the lines of a stock exchange, to bring more discipline to the spot markets.

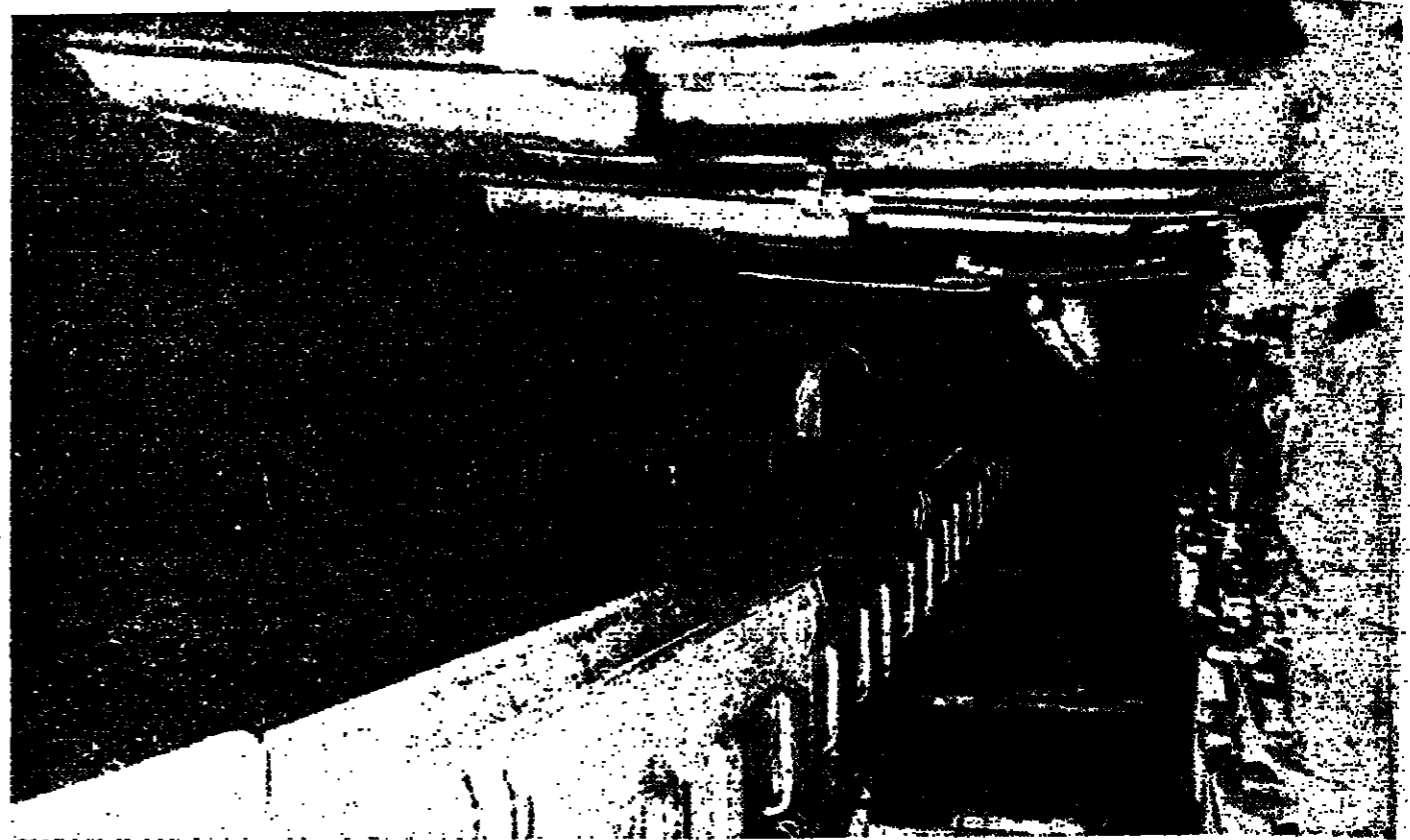
Current trends suggest that the EEC is more likely to limit its oil imports by restricting demand than by expanding supply from indigenous sources. The assumption is implicit on the Community's decision to try to change the link between economic growth and energy consumption from its past

ratio of one-to-one to 0.8-to-one over the period. That, of course, would be an average over several years, as figures can vary widely from year to year, depending on the movement of the business cycle.

The European Commission believes that a serious start has been made to conserving energy already, though disagreements persist with the U.S. over whether the Americans or the Europeans have done most over the past few years. According to EEC statistics the Community's total oil consumption fell by almost 10 per cent between 1973 and 1978, the U.S. recorded gains of 10.5 per cent and 34 per cent respectively, though at a time when its economy was growing faster than those of European countries.

The degree of effort put into conservation varies significantly between EEC countries. By and large, Germany, Denmark and the Netherlands, have undertaken the most expensive and ambitious programmes, with Britain and France not far behind. Less has been done by Belgium, where demand has been depressed anyway by the slump in its steel industry, and by Ireland and Italy, the EEC's two least-developed economies.

The emphasis on demand as the main instrument for cutting oil imports stems largely from the uncertain prospects for any significant medium-term expansion of the Community's own energy production. Further, the supply mix varies between countries much more than the pattern of consumption, and it has proven impossible so far to achieve the kind of political



Advanced technology coal mining equipment being used at Bentley Colliery, Doncaster. Coal is the best hope for filling Europe's energy gap

compact between governments needed to create a genuine common policy in this area. For the foreseeable future, supply policies seem likely to remain firmly in national hands.

Only Britain has any sizeable oil resources of its own. But while these should be sufficient to ensure its own self-sufficiency over the next decade, production will not be enough to satisfy more than a fraction of other member states' needs. The Netherlands still has large reserves of natural gas, though output levels are expected to continue to decline.

In the nuclear field, only France is pursuing a really aggressive expansion programme. It aims to increase its installed nuclear capacity from 6.5 Gigawatts in 1978 to 15.6 GW by next year and to 38.3 GW by 1985, by when it expects that more than half its electricity supplies will be generated in nuclear plants. But strong political resis-

tance has stalled the development of nuclear power in Germany and the Netherlands, while Italy is experiencing practical difficulties in getting its programme off the ground. Despite EEC leaders' public commitment to giving nuclear power a high priority, it now looks as though installed capacity in the Community as a whole will be only about 88 GW by 1985, half the target level fixed for that year in 1975.

That leaves coal, the Community's biggest indigenous energy resource, as the remaining hope for filling the gap. Both Germany and Britain have been pressing for months for an agreement on a proposal for the Commission to grant Community subsidies to encourage the use of EEC-mined coal in power stations. But the plan has made little headway so far. It faces both political and practical obstacles. Mr. Anthony Wedgwood Benn, Britain's former Energy Secretary, managed

to antagonise his EEC counterparts so effectively while in office that there was no incentive for them to give him what he wanted. His successor, Mr. David Howell, has not yet had the opportunity to retrieve the situation, though his style is better appreciated in Brussels. In addition, Italy which imports almost all its coal from outside the EEC, has insisted that it will approve the proposal only if other governments agree to subsidies to help reduce its excess refinery capacity.

The size of the coal subsidy envisaged, about \$140m, is also too small to make much difference. The EEC imports about 45m tonnes of coal a year at prices as low as \$30 per tonne, as little as one third of the price of coal mined in the Community. Further, there is not much EEC-mined coal available: about 80 per cent of last year's output was burned in the two countries which mined it.

Britain and Germany, though supplies would presumably respond to a strengthening demand.

The Commission has not yet abandoned hopes for the scheme and intends to press hard for its adoption before the end of this year. But it is doubtful whether any agreement can be reached unless it contains some provision also to subsidise imports from outside the Community.

Ironically, the one area where the Community has chalked up a modest success is in helping to sponsor research and development of more unorthodox alternative energy supplies including geothermal, solar hydro-electric and wind power. But last year these sources supplied less than 4 per cent of total needs and are likely to remain peripheral for many years to come.

Guy de Jonquieres

INTERNATIONAL OIL COMPANY

invite applications for
GENERAL MANAGER—EUROPE
for its office in London

This position requires a decision-making international oil trader with relevant experience in Europe and Africa. The successful candidate must have an overall knowledge of both crude and refined product trading and be willing and able to supervise the office's activity in all its aspects. Fluency in foreign languages is an important consideration as this position requires extensive travelling. An attractive salary and substantial fringe benefits will be offered in accordance with qualifications and experience.

OPERATIONS MANAGER

This newly developed position requires applicants with varied experience in the total operational aspect of oil trading. Knowledge of international banking, ship chartering and documentation is a must for the successful candidate. Attractive salary and incentive benefits will be offered in accordance with qualifications and experience. Please reply in strictest confidence giving full details of experience, age, education and salary.

Write Box A.6901, Financial Times,
10, Cannon Street, EC4P 4BY.

CONSULTANTS REQUIRED IN ENERGY INDUSTRY

We wish to retain marketing consultants to prepare reports analysing and forecasting the European markets for:

- ★ NUCLEAR EQUIPMENT & COMPONENTS
- ★ ENERGY SAVING CONTROLS
- ★ ALTERNATIVE ENERGY SYSTEMS

Product knowledge essential. We are an internationally known firm and can provide continuous assignments. Replies will be kept strictly confidential.

Write Box A.6923, Financial Times, 10 Cannon Street, EC4P 4BY

Sources

CONTINUED FROM PREVIOUS PAGE

compared with estimated 1979 imports of 5.4m barrels.

It is officially claimed that Japan can stay within the 6.3m barrels limit and still achieve the GNP growth rate of 5.8 per cent per year (real terms) laid down in the latest seven year social and Economic Development Programme — published this summer. Oil imports, however, will have to grow at less than half the GP growth rate if both targets are to be attained, a difficult if by no means an impossible task.

As an oil importer Japan faces one major problem not shared—or not shared to the same extent—by other industrialised countries. It was heavily dependent, until the recent past, on "third party" sales by the international majors and so has suffered badly from the recent cutback on such sales.

About 40 per cent of the average of 3.8m barrels per day which the majors were channelling to third parties before the Iranian revolution were destined for Japanese customers. When these sales were cut back after the Iranian revolution Japanese importers (including refiners) were obliged to make up much of the difference by buying from

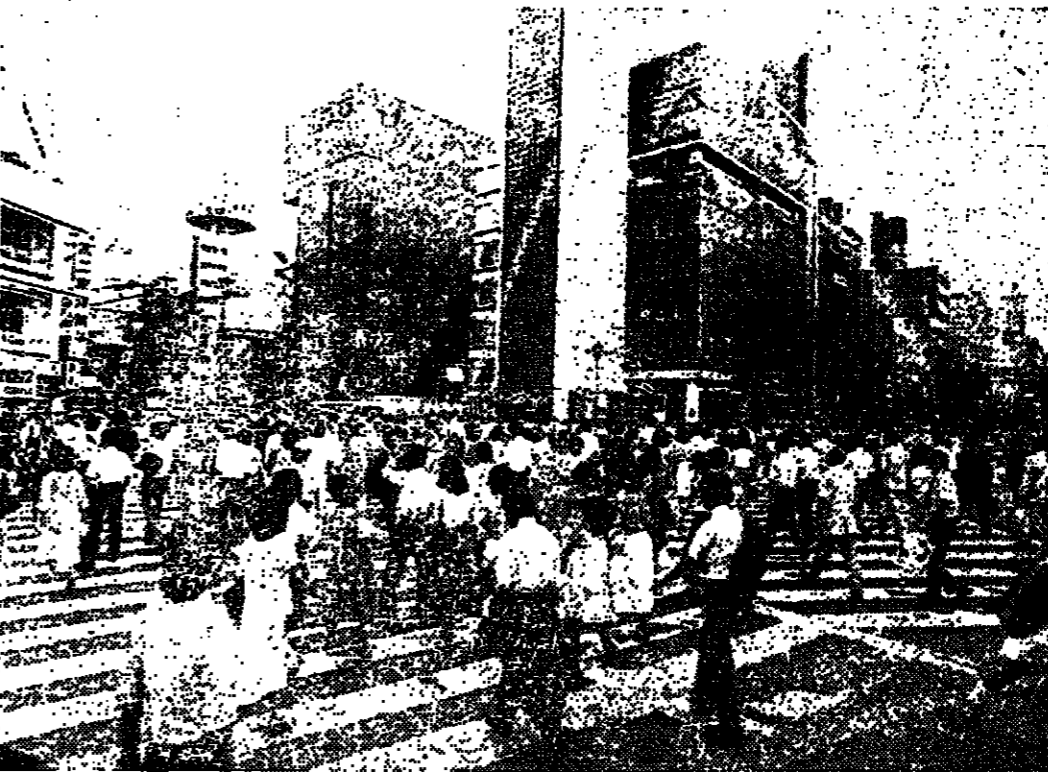
the spot market—a course of action which, not surprisingly, helped to push up spot market prices.

Japanese companies are still understood to be experiencing great difficulty in filling the gap. These difficulties have prompted left by the major's cutbacks, the government to step up its efforts at arranging direct deals with oil producing countries (including Iran and Mexico).

In the first half of the current fiscal year (starting last April) Japan was relatively successful in meeting its oil import needs. Stocks were held steady, or rose slightly through the six months and the government was able to claim that, for the time being, everything was under control.

MITI has remained silent however—possibly because of a reluctance to rock the boat during the campaign running up to Japan's general election last Sunday—about the prospects for the second half of the fiscal year. During this period it could prove more difficult to import enough oil to meet consumption levels with the result that stocks may have to be drawn down.

Charles Smith



Japan's energy-saving measures include Sunday closure of petrol stations and reduced use of air-conditioning in offices and government buildings. Pedestrians in the Ginza district of Tokyo

Why did 40 Companies decide to locate in CLWYD last year?

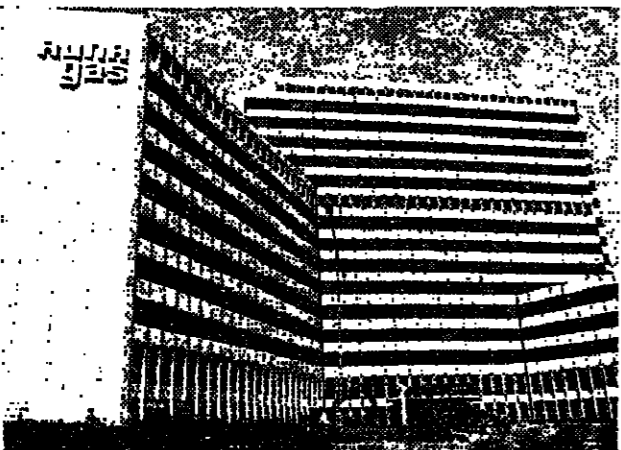
Because they realised that Clwyd's large multi skilled work force, proximity to major markets, and national/international communications networks were tailor-made for them.

With its full Development Area status, this progressive Welsh county dominates the regional development scene. The news in Clwyd is about sales, not strikes—and it's a great place to live too. Talk to us about the low-cost sites, the factories and the extensive financial aid available to incoming industries—we'll make you a deal you can't refuse.

Contact Wayne S. Morgan, County Industrial Officer, Clwyd County Council, Shire Hall, Mold, Tels. Mold 21211 for your free colour brochure.



Ruhrgas in the International Energy Business



Ruhrgas supplies natural gas to a large market in the Federal Republic of Germany through a complex pipeline system which carries the gas to the customers. Ruhrgas has concluded a number of major natural gas import agreements and is currently involved in other natural gas import projects. Ruhrgas is a partner of standing in the international natural gas business.

RUHRGAS AKTIENGESELLSCHAFT · ESSEN

Natural Gas **RUHR** is Our Business **gas**

مركزنا للتجارة

The men at the centre of tax avoidance

"I WENT into tax avoidance mainly for the intellectual challenge. Of course the money was a factor, but it was secondary." So says Mr. Roy Tucker, one of the most successful tax avoidance experts in the country.

The money may have been secondary, but there was a great deal of it. Mr. Tucker and his close associate Mr. Ronald Plummer each put together a fortune in the six years to 1978, a time when fortunes were hard to make and keep.

They estimate that between 1972 and 1978 their vehicle, the Rossminster group of companies, made £5m clear profit out of avoidance activity alone. Those profits are reflected in family trusts set up by the two men, each trust owning 41 per cent of Rossminster.

The two men may have made fortunes, but the Inland Revenue has fought a bitter battle to ensure that their riches are not enjoyed in peace. As well as the standard measures—taking the individual avoidance schemes through the courts all the way up to the House of Lords—the Revenue attacked last year with retrospective legislation.

In July it moved the battle against Rossminster on to a new plane when it conducted a series of dawn raids on offices and homes of individuals connected with the group, including Mr. Tucker and Mr. Plummer.

The raids were made because the Revenue suspected tax evasion—something quite distinct from avoidance—and vast loads of documents were seized which might, in the Revenue view, help to prove evasion.

In three weeks' time the Law Lords will hold hearings on whether the raids were permissible, after Lord Denning and the appeal court found in August that the Revenue had overstepped its powers.

Whatever the legal outcome, the raids have raised the level

of battle between Rossminster and the Revenue into what, in retrospect, is likely to prove the most celebrated tax dispute of the century.

The seeds of the conflict were sown at the beginning of the decade. The two men met when Mr. Tucker joined Mr. Plummer in the summer of 1968 as one of the half-dozen London tax managers of the international accounting firm Arthur Andersen.

Both were chartered accountants, with Mr. Plummer, who was 32 years old, the senior by three years. In early 1971 Mr. Plummer left to become the head of Slater Walker's tax department. Shortly afterwards Mr. Tucker also left Arthur Andersen, to set up in January 1972 his own accounting company.

Later that year the pair began operating the first of a series of avoidance schemes, using the financial services of Slater Walker. There was nothing new about avoidance as such, but the Tucker/Plummer brand was a sports car model compared with the horse-and-cart approach that had generally gone before.

In the 1950s and 1960s avoidance was a relatively unexploited area. Dividend stripping was common in the 1950s, for example, while there were hundreds of simple ways of transforming income into capital gains, which were entirely untaxed before 1965.

By the later 1960s it was becoming more difficult as increasingly sophisticated financial arrangements were required to avoid tax successfully within the letter of the law. One master of the art was Mr. Godfrey Bradman, whom Mr. Plummer and Mr. Tucker had known since 1962. However, in 1972 the property boom was under way and Mr. Bradman had left the field of avoidance temporarily for green pastures elsewhere. This gave Mr. Plummer and Mr. Tucker a clear run.



The men behind Rossminster: Mr. Ronald Plummer (left) and Mr. Roy Tucker

The new, highly artificial schemes coming from Mr. Tucker's fertile mind required banks and financial companies prepared to make them work. Avoidance is quite distinct from evasion, which is the criminal offence of not declaring income or profits. By contrast avoidance works within the law.

In the unsophisticated days it was simply planning one's affairs so that minimum tax was payable. Under Mr. Plummer and Mr. Tucker it was to emerge in the form of schemes bought by rich customers instructing them to conduct a series of complex and interconnected transactions whose sole motivation and result was the avoidance of tax.

Mr. Tucker says: "I was frustrated under the Arthur Andersen umbrella because it was impossible to set up the

necessary banking and financial structures." Clearing banks were unwilling to help because the requirements were too complicated.

So Mr. Tucker was able to persuade Slater Walker, where Mr. Plummer was the tax manager, "to co-operate in the sense of lending money on certain schemes."

Two schemes were operated through Slater Walker, a reverse annuity scheme to avoid income tax and a capital gains tax scheme called "Exempt Debt Schemes."

There were about 50 clients, all private individuals, for the first scheme in 1972, and they saved about £150,000 in tax between them. Mr. Tucker estimates his net profit was £10,000. "It wasn't much, but it provided us with working capital."

The scheme was highly plagiarised by other tax avoidance specialists, and although it ran until 1976 there were never more than about 100 people using it each year. The plagiarism added a second motive for secrecy, already valuable since it prevented the Revenue legislating against a scheme before it found out about it in the annual returns.

The second scheme, which ran for two years, was much more substantial, operating on capital gains of about £15m. However, the lion's share of the profit went to Slater Walker, for its banking services.

At the beginning of 1973, Mr. Plummer left Slater Walker. "Jim Slater was making so much money on other things then that he didn't really want to make it through financing tax schemes, which he didn't

completely understand. But I could see that the demand for schemes was there." Rossminster was formed in July 1973.

To take over the Slater Walker banking functions a new bank, Rossminster Acceptances, was created. This started with deposits of less than £150,000, but these soon expanded as a third scheme, the One Year High Income Scheme, began to be marketed.

About 200 individuals, ranging from City businessmen and pop-stars to sports champions, took part, to the tune of about £10m, an average of £50,000 income each. Net profit to Rossminster probably totalled £500,000, while a further £500,000 went in fees for introductions to customers.

A major effort went into marketing the schemes. Rossminster chose about 100 firms of solicitors and accountants, together with a few insurance brokers, through which the schemes were sold. The tax advisers from the selected firms would visit Rossminster one by one to have the schemes presented to them individually. They would pass them on to clients, taking a healthy fee for doing so.

Where did Mr. Tucker get the ideas for all his schemes? The most fruitful source, he says, was studying legislation that the Revenue had introduced to put a stop to previous schemes.

"After working out the avoidance objective the Revenue was trying to ban, you start thinking of other ways of reaching the same result."

In July 1974, Rossminster took the big step of producing schemes for companies as well as private individuals. This required the purchase of a bank, from Grindlays, that was recognised by the Revenue since the use of an unrecognised bank would have slowed down the operation of the scheme and had cash-flow disadvantages. The bank, renamed

First London Securities, cost £300,000.

The first corporation tax scheme, a version of the High Income scheme for individuals, operated for two years, and is estimated to have saved tax on about £100m of corporate profits. It was succeeded by an equally successful Gross Annuity Scheme.

Mr. Tucker and Mr. Plummer estimate that about 400 close companies used the schemes, saving tax on average profits of £200,000 to £300,000 each.

1978 and now market no new schemes.

Mr. Tucker and Mr. Plummer say the non-avoidance part of their business grew steadily from the mid-1970s, and they were planning to stop marketing schemes anyway. Mr. Tucker explains: "When we started we realised we wouldn't go on for ever because avoidance is very exhausting."

"Also, I would be less happy about doing it now, with the new Government and lower tax rates. At the time it seemed a good thing to be doing. We thought it provided a safety valve. We really did stop people leaving the country and provided working capital for medium size companies before stock relief was available."

The pair may have stopped marketing new schemes, but Mr. Tucker still spends half his time battling the Revenue, whose strategy against the schemes has been not only to legislate against them but to challenge them under existing law by taking test cases through the courts.

The Tucker schemes came complete with a guarantee that he would conduct the defence of the test cases, as well as bearing the legal costs, probably about £50,000 in each instance from Special Commissioners of taxation to the Lords.

It is a full court programme. Two schemes are now waiting to be considered by the Law Lords, one of which was lost at appeal stage and the other won. Two further schemes start the trek through the courts in the next three months with hearings before the Special Commissioners. All this is quite apart from the Law Lords hearing on the Revenue raid, which is due to start on October 29.

It looks as if one of the most lasting heritages of the high tax rates of the 1970s will be a series of full-blown court confrontations stretching well into the next decade.

Inflation and instability

From Mr. Geoffrey Rippon, QC, MP.

Sir,—The opinion expressed by Morgan Guaranty Trust (as reported on October 5) about the total inadequacy of the international monetary Fund's account proposals reinforces my own repeatedly stated views. In the House of Commons, in the European Parliament, last month at the Financial Times Conference in Korea, and more recently to the Company of Builders at Guildhall, I have tried to warn of the dire consequences that must result from the lack of any concerted international plans to deal with inflation and chronic currency instability.

Writing has been on the wall for a long time. Last year, speaking from the Conservative Front Bench, I expressed my belief in the view that further procrastination in negotiating agreed reform of the world's settlement and reserve system would inevitably trigger an utter collapse of the international paper dollar standard. This is what is happening. I suggest that the following action is urgently needed.

The U.S. Administration should stop its insane gold auctions forthwith. They only serve to knock the dollar further down while pushing up the price of gold. What confidence can anyone have in the economic state of a country which regularly auctions off its most valuable asset—its gold reserves—thus ensuring a double blow to the credibility of its currency?

We should adopt the fundamental reform, (for which Professor Robert Triffin has argued vainly since 1958) of replacing dollars as the major source of world reserves with gold. I guarantee deposit accounts at the IMF. It is high time the "experts" ceased deluding themselves that gold can be entirely replaced by some form of funny IMF paper money which large sections of the world will accept as more secure than a commodity which has been valued and hoarded for centuries.

At the very least we need a more orderly exchange rate adjustment process, with the IMF exercising greater surveillance and guidance to prevent nations from pursuing selfish goals at the expense of international stability.

We need concerted international action to bring down interest rates. In many countries—including Britain—interest rates are now so high that they are a major factor in fuelling inflation, stifling productive investment, and in fast turning recession into the worst depression of the century.

Geoffrey Rippon, House of Commons, SW1

Letters to the Editor

annual £500m which the NCB wants for "investment."

When will the public realise that excessive mining "productivity deals" have been at best spurious and at worst fraudulent? Why is productivity so low when recent investment and pay policy has been designed, so we are told, to improve it?

If it is indeed necessary to have a high wage/short hour mining industry—and it may well be—why not start installing the technology which will allow us to achieve it?

(Sir) Horace Cutler, County Hall, SE1.

Attitudes to metrication

From the Director National Consumer Council.

Sir,—Mr. Zahler (October 4) referred to the National Consumer Council's views on metrication. It is true that, reflecting the opposition to metrication of everyday weights and measures by a majority of the general public, the National Consumer Council was originally opposed to the intention of the last Government to take powers to impose compulsory metrication of food-stuffs in 1976.

Since then, however, consumers have had wide experience of the process of metrication. The number of complaints about it appears to be minimal and, although many adults continue to be critical of the changeover, the NCC has a special concern for the younger generation of consumers who have been taught in metric measurements and who still find themselves facing out-of-date traditional measures at work and in the shops.

The population at large continues to be very concerned that traders will take the opportunity of the changeover to increase prices unjustifiably. We have therefore urged consumers to be alert to such fears, whether or not they are justified, it would be advisable to set up a metrication monitoring unit to which such issues could be directed. Moreover, we have taken the view that metrication has not gone so far that any further delay must be to the continued confusion and disadvantage of consumers in general. If monitoring were provided for, well-advertised and supported by the Government, we feel that this would enable metrication to go ahead calmly and methodically instead of by fits and starts.

Though consumers' attitudes towards metrication in general are well researched and documented, no-one so far as we know has attempted to find out what their attitude is to the specific issue of whether, having come so far, the process of metrication should be left to individual action by traders or brought more speedily to a definite conclusion. The NCC intends to carry out research to find out what ordinary consumers think should happen about this issue.

Jeremy Mitchell, National Consumer Council, 18 Queen Anne's Gate, SW1.

Case lore on spin-offs

From the Managing Director, Sermatech, and Mr. R. Tudway.

Sir,—In his article "A plan for de-merging" (September 25), Geoffrey Owen draws attention to an important gap in thinking concerning competition policy in the UK, by suggesting that there is a need for measures to encourage corporate divestment alongside those which exist to limit conglomerate growth through acquisition.

He rightly stresses the difference in attitudes in the USA towards competition policy which express a more fundamental concern with the need to promote competition by eliminating barriers and, in particular, by imposing the climate in which small firms struggle to survive and prosper.

The "spin-off" mechanism as a means of realising divestment has much to commend it, apart from the reasons given by Mr. Owen. There are, for instance, the still largely under-exploited uses of this mechanism as a means for dealing with the challenges of innovation and organisational change, to say nothing of its potential for alleviating the consequences of functional obsolescence that could provide a much needed alternative to the depressing prognosis of decline, decay and eventual death which seems to afflict so many sectors of British industry. But despite the considerable interest throughout the industry to develop more effective mechanisms for exploiting new business opportunities, there is little case-study material against which policies designed to stimulate divestment through "spin-off" can be formulated.

Is there not here a potentially more efficacious role for the Monopolies Commission than meddling in the affairs of individual companies of the calibre of GEC no matter how large? A study of the factors influencing success and failure in "spin-off" company formation would provide information that could be the vital ingredient in the much needed process of industrial regeneration throughout Europe.

Joseph Caffe and Richard Tudway, Sermatech, 520 Chesham House, 150 Regent Street, W1.

To audit or not to audit

From Mr. J. Butterworth.

Sir,—I wish to take issue with Mr. David Smith's remarks on the Management Page of October 3. It is not true that creditors resort only to trade or bankers' references when deciding whether to grant credit to small businesses. Any professional credit manager worth his salt will seek audited accounts before approving substantial credit exposure on small companies. In this context accounts a year old are valuable since they show trends, whether the business is profitable or not, and how much of the profits directors are either taking out or re-investing. References tell the credit manager none of these things.

It is also not true that a clearing-bank relies mainly on personal guarantees to finance such business. If this were so, why then do banks take general charges? The main asset of most small businessmen is their interest in the business.

So creditors do need audited accounts and these accounts need to be filed at Companies House. Auditors therefore fulfil a valuable role. A small company armed with its audited accounts is in a position to negotiate a better deal with a poten-

Case lore on spin-offs

tial supplier than a company without such accounts.

Mr. Smith is concerned about the auditor's technical problems in reporting on small businesses' books. I am not aware that the auditing profession are heavily criticised in this area and they have, in any case, the option of qualifying their audit report.

I do read of auditors in trouble over their audit reports on large companies which subsequently go into liquidation, but these are the very companies it is agreed should still be audited.

The auditing and filing at Companies House of a small business's annual accounts is not a terrible imposition on the small businessman but a reasonable quid pro quo for limited liability and I am concerned that there are today those who try to throw doubt upon this principle.

John Butterworth, International Factors, Circus House, New England Road, Brighton, Sussex.

Case lore on spin-offs

From the Managing Director, Sermatech, and Mr. R. Tudway.

Sir,—In his article "A plan for de-merging" (September 25), Geoffrey Owen draws attention to an important gap in thinking concerning competition policy in the UK, by suggesting that there is a need for measures to encourage corporate divestment alongside those which exist to limit conglomerate growth through acquisition.

He rightly stresses the difference in attitudes in the USA towards competition policy which express a more fundamental concern with the need to promote competition by eliminating barriers and, in particular, by imposing the climate in which small firms struggle to survive and prosper.

The "spin-off" mechanism as a means of realising divestment has much to commend it, apart from the reasons given by Mr. Owen. There are, for instance, the still largely under-exploited uses of this mechanism as a means for dealing with the challenges of innovation and organisational change, to say nothing of its potential for alleviating the consequences of functional obsolescence that could provide a much needed alternative to the depressing prognosis of decline, decay and eventual death which seems to afflict so many sectors of British industry. But despite the considerable interest throughout the industry to develop more effective mechanisms for exploiting new business opportunities, there is little case-study material against which policies designed to stimulate divestment through "spin-off" can be formulated.

Is there not here a potentially more efficacious role for the Monopolies Commission than meddling in the affairs of individual companies of the calibre of GEC no matter how large? A study of the factors influencing success and failure in "spin-off" company formation would provide information that could be the vital ingredient in the much needed process of industrial regeneration throughout Europe.

Joseph Caffe and Richard Tudway, Sermatech, 520 Chesham House, 150 Regent Street, W1.

GENERAL
UK: Conservative Party conference opens, Winter Gardens, Blackpool (until October 12).
Zimbabwe Rhodesia constitutional conference continues, Lancaster House, London.
BL workers in protest march through London to present petition at Leyland House against proposed redundancies.
International energy management conference opens, Mr. Alex Jarrett, Reed International chairman presiding, Birmingham (until October 11).
Seminar on Florida's commercial opportunities for British businessmen, Mayfair Hotel, London.

Today's Events
Warsaw Pact countries meet, East Berlin.
OFFICIAL STATISTICS
Provisional figures of vehicle production (September). Central Government transactions (including borrowing requirement) (September). London clearing banks' monthly statement (mid-September). UK bank's eligible liabilities, reserve assets, reserve ratios and special deposits (mid-September).
COMPANY RESULTS
Final dividends: Bejam Group, Highland Electronics, News International, Stothert and Pitt, Interim dividends: Amalgamated Power Engineering, Associated Biscuit Manufacturers, Banker's Investment Trust, Barr and Wallace Arnold Trust, Bowthorpe Holdings, Earnell Electronics, Lesney Products, M. F. North, Ruberoid, Sears Holdings, Senior Engineering Group, Silentsight Holdings.
COMPANY MEETINGS
Ashley Industries, Winchester House, London Wall, EC, 11.30. As-ram Trading, Victoria House, Vernon Place, WC, 12.00. Bogod-Pelepah, 52-54 High Holborn, WC, 12.00. United British Securities Trust, Bucklersbury House, 83 Cannon Street, 12.00.

Astonishing things have been happening to Sodastream recently

Early in 1973 Sodastream moved 15 employees into a small standard factory in Peterborough.

In the next year the country was hit by the first oil crisis, crippling strikes, and the 3-day week. Yet Sodastream trebled its turnover.

Today, the company employs 250 people and is building a giant 150,000 sq. ft. factory where 400 will work.

Their fizzy-drink machines are now exported to four continents.

By next year their output will have trebled again.

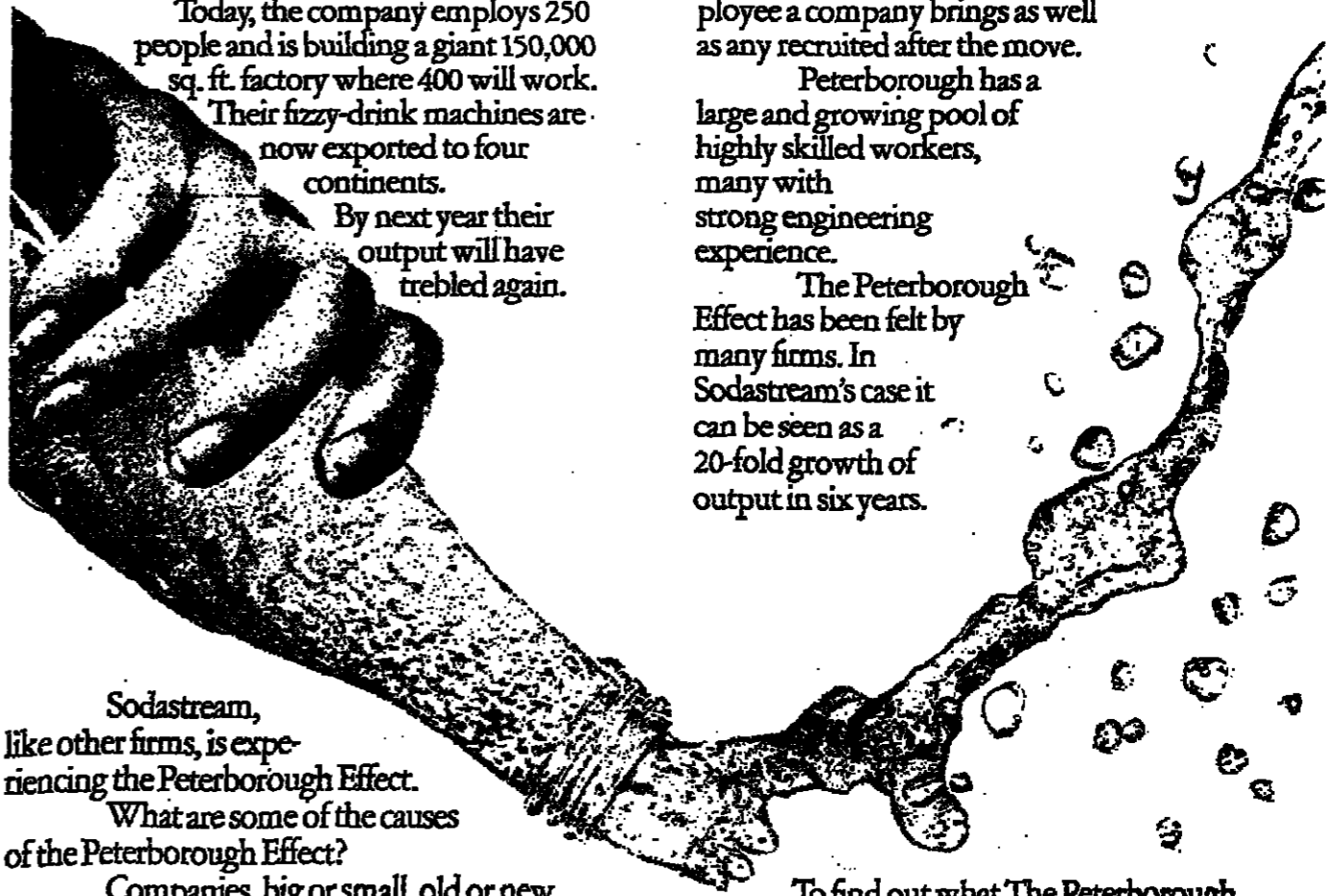
expanding city to the East Coast ports.

Because Peterborough is a mature city as well as a new town, it is never difficult to persuade key people to move with the company.

We offer to house every employee a company brings as well as any recruited after the move.

Peterborough has a large and growing pool of highly skilled workers, many with strong engineering experience.

The Peterborough Effect has been felt by many firms. In Sodastream's case it can be seen as a 20-fold growth of output in six years.



Sodastream, like other firms, is experiencing the Peterborough Effect.

What are some of the causes of the Peterborough Effect?

Companies, big or small, old or new, can move straight into new standard factories of the right size. Then into bigger ones or into their own sites as soon as they require.

Lower rents mean lower overheads.

Peterborough, on the A1 and only 46 minutes from London by train, is also the nearest

To find out what The Peterborough Effect can be for your company, please ring John Case, our Chief Estates Surveyor, on 0733 68931.

It must be the Peterborough Effect
Peterborough
Cathedral city - new town

Companies and Markets

UK COMPANY NEWS

Glaxo sales and profit hit by exchange rates

FOLLOWING THE drop from £40.25m to £36.5m at midway, profits before tax of Glaxo Holdings fell to £72.77m in the year ended June 30, 1979, compared with £86.36m in the previous year.

The directors say the year's results were significantly affected by the increase in sterling's exchange value. However, they are recommending a final dividend of 11p against 9.9p to lift the total from 11.4p to 16p. A one-for-one scrip issue is also proposed.

HIGHLIGHTS

Lex considers why Glaxo's profits have come under pressure though the group tried to sugar the pill with a higher dividend and a scrip issue. Ladbroke Group has put forward a surprise deal to set up a new casino division in the hope that it will overcome its legal problems. Freemans, the big mail order house, reports rather disappointing figures for the first six months and is very cautious over the trend this winter. Finally Lex looks at the reactions of financial markets to the weekend Dollar package and assesses the implications of yesterday's economic statistics on wholesale prices and GDP. On the inside pages there are comments on Albert Martin, Reed Executive, Hunting Gibson and William Boulton.

	1978-79	1977-78
	£000	£000
Sales:		
External customers	377,828	382,234
To Vetric	19,639	17,652
Wholesaling by Vetric	19,418	15,312
External sales	338,586	349,264
Trading profit	71,753	80,529
Associates' share	2,185	2,281
Interest payable	1,688	3,154
Profit before tax	72,270	86,364
Tax	35,875	42,889
Net profit	36,395	43,475
Minorities	505	1,138
Dividends	13,528	9,533
To reserves	22,867	31,857
Less investment income		

Tax absorbs £35.88m against £43.88m giving earnings per share of 42.5p compared with 48.1p. Fully diluted earnings are 40.3p (46.4p).

139 companies wound-up

Compulsory winding-up orders against 139 companies were made by Mr. Justice Oliver in the High Court. They were:

Hamber Plant Hire, Mountain View Estates, Harache and Company, Peter G. Harris, Unyield, I.S.C. Integrated Services Consultants, Fenton Brown and Company, Graham Lloyd Associates, A. Roach and Company (Transport), Stylered, Fabastruct, Lenology, Milliglen, P. B. Whitford (International), Stander Carpet Services, Advest (International), Modern Household and Catering Distribution,

H. Hill and Son (Plasterers), Gilbray Holdings, Jays The Newsagents, Grencliff, O'Brien Garden Landscapes, Cavenham Insurance Bureau, Ulvastar,

Tony Allen Associates, P.H. Conversions, Figure Developments, Ambassador Service Station, McAuliffe Bros. (Earthmoving), Kenilgen, Jeffrey Davis (Maintenance), Fracevove, Elvitt, Philip Goulden Estates, Bozeville Etc., Avbrovery, Satlak, Lightfoot and Company (Insurance Brokers), H. J. Keirle (Motor Engineers), Richlam Contractors,

The Middleton Mineral Company, Navet Builders, Blakerose, C.T.T. Building and Civil Engi-

neering, Inexist Properties, SP Construction (Midlands), DJT Electro Lighting, Safecell, Office Klean and Valet Services, Okraded, Processwise, Haymarket Travel, Watermill Instruments, David Orr, E. and J. Poulterers,

Investment and Financial Management, Meshworth, Superlamp Metallic, Saxon Transport, Noble Proofings (Contracts), P. F. Freedman and Co., S. and B. Contractors, Hyde Park Insurance Brokers,

Gilgate Construction, Mexbond, Alan Bostock (Crews), Chow Sutherland Holdings, Exotic Frozen Foods, T. B. Beodalt, Grant Sign Systems, Demroot, Chapnoon, Lucas Brothers (Roofing), Burnham and Bainbridge, Taglaglen, Lexy Jeans, Skin Connection, W. Boulter and Sons (Felkstone), W. Boulter and Sons (Southern),

Pepperwell, Castmayne, Ambleside Construction Company, Jim Haddon Productions, Galiant Construction, Nadbond Building, Prelanmay, Harris and Herd (Roofing, Heating and Sanitation),

Barnett and Grove, Brailes Construction Company, R. C. B. John (Builders and Civil Engineering), Tangmere Estates,

Whitefield Soft Drink Company, Repenay, The Greaves Organisation, M. A. S. Leather Fashions, Eatonville Construction, D. Clifford Clothing Manufacturing, G. Rodgers and Company (Pode Hole), Parcel Electric Company, Fivona Furniture Company, Auric Shearing, Leemark Motor Factors, Derek Tyne,

Tamar Fish Processors, Teakgate, Whitehall Cycle and Motor Company, K. J. Marris, Gimble (Department Stores), Double "R" Engineering, Advance Security Services, D. P. Transport (Berwick),

Sherwood Wrought Iron, Southerk, Starlite Artistes, Turner Associates (Consultants), Hallmark Garages, Patsville, James Drinkwater (Decorations),

Molyneux Hay and Company, Ribbrow Fish Processors, Tournament Contractors, Firecrest Estates, Kelviawend, 544 Research,

Allbright Metal Finishing, Bond Worth, Alarworth, Reel Service Station, Trimgrange, Seevon, Clima Energy Concepts,

M. C. McGinty Contracts, Fleetbridge Supplies, Glitterchoice, Edenlock, H. R. Goddard (Finance), Baron Yemm Developments,

Midway advance at Freemans

TURNOVER, including VAT, expanded from £100.8m to £114.7m and taxable profits rose to £7.8m against £7.21m at Freemans (London SW9) for the 28 weeks ended August 11, 1979. And the board is confident that profits for the full year will exceed the record £16.75m for 1978/79.

The year started badly, with an estimated loss of over £3m sales because of the delay in the company's receipt of catalogues and goods during the transport strike.

It was hoped that it would still be possible to achieve the original targets by the end of the year, but this is now unlikely, directors state.

Considering the retail sales background during the summer, the second catalogue has started reasonably well, but they say this is a particularly difficult season to forecast.

Pre-tax figures for the 28 weeks were struck after interest of £169,000 against £292,000 and was subject to tax of £4,078 compared with £3,75m. Net profit came through ahead from £3.46m to £3.75m.

	28 weeks	1978	1979
	£000	£000	£000
Turnover	114,671	100,755	
Interest	169	292	
Pre-tax profit	7,802	7,211	
Tax	4,078	3,748	
Net profit	3,724	3,463	
Dividends	1,045	720	
Including VAT of £8.85m (£7.13m)			

The interim dividend is effectively raised to 1.5p (1.05p) net per 25p share—last year's final payment was 1.5195p.

See Lex

Perkin-Elmer Reed Executive interim profits advance £0.47m

FOLLOWING A rise to a record £2.28m for the previous year, taxable profits of Reed Executive expanded from £792,000 to £1.25m for the first half of 1979, on turnover well up at £14.5m against £9.78m.

The directors of this employment agent and drug store operator, state that the period has been the most profitable in the company's history.

The demand for temporary staff has been very buoyant, they say, and a vigorous expansion programme has been carried out.

The 1978 annual accounts noted that an award plus costs,

from £14.88m to £16.39m in the year ended June 30, 1979, and pre-tax profits were higher, at £2.23m against £1.82m.

Tax takes £820,000 against £985,000 and dividends absorb £500,000 (£450,000).

The group designs, makes and sells scientific analytical instruments.

Ayrshire Metal well ahead

AFTER A bad start, due to the lorry drivers' strike, a satisfactory level of sales, production and profitability have been achieved in all operating units of Ayrshire Metal Products for the first 26 weeks of 1979, the directors state.

During the period ended June 15 taxable profits of this light engineering and steel fabrication concern expanded from £225,000 to £781,000 on sales ahead to £7.4m against £6.67m.

The directors add that if these levels can be maintained it would be reasonable to expect second half profits to match the corresponding period last year—some £587,000 profits then lifted the figure for 1978 to a record £1.41m.

The net interim dividend per 25p share is increased to 2p (1.7115p), last year's final payment being 3.2855p.

Pre-tax figure for the first period included interest received of £50,000 compared with £25,000 interest paid, and was subject to an extraordinary debit of £9,000 (nil).

	1978	1979
	£000	£000
Turnover	14,311	14,500
Interest	215	187
Pre-tax profit	1,251	1,252
Tax	474	407
Net profit	777	845

This appeal has now been withdrawn and the award of £65,000 plus interest of £58,000 will be reflected in the annual accounts for 1979.

Merchandise operated within budget, an increased loss of £216,000 (£187,000)—included in the pre-tax profit—being due to expenses incurred on new branches.

The directors anticipate opening six more branches by the end of the year. The investment being reflected in the company's lower tax charge, in percentage terms, for the first half of £474,000, compared with £407,000.

On increased capital, from a scrip and consolidation, earnings are shown as 7.4p (3.57p) per 10p share at the halfway stage. The net interim dividend is effectively raised to 1.5p (0.9p)—last year's final payment was an adjusted 2.45235p.

comment

The current boom which employment agencies such as Brook Street Bureau and Reed Executive look to be well founded. The growing trend toward temporary staffing seems to have been the key to Reed's interim advance. It has also been important that the 130 Reed shops are concentrated in the south-east, where unemployment is lower than the rest of the country. The group has lost money while starting up a chain of toiletry stores (19 should be open by Christmas), but will be able to reap the benefits of a lower tax charge this year by claiming relief on these losses. The Medicare chain appears to be doing moderately well though, and should become profitable in 1980. The interim dividend is up by two-thirds and a ten per cent lift on the total net could improve the yield to a prospective 5.3 per cent at yesterday's share price of 100p, up 7p. Some analysts are looking for a 1979 pre-tax profit of £2.5m which suggests a p/e of 6.6 on a full tax charge.

New Sylhet profits dive

Pre-tax profits of New Sylhet Holdings, tea concern, dived from £105,379 to £44,988 for 1978, on turnover down at £311,667 against £247,323.

After tax of £28,331 (£53,744) net profit came through at £8,857 compared with £51,635 giving earnings of 3.2p (26.63p) per £1 share.

Hunting Gibson continues to improve—6p interim

A £1.2m turnaround to profit in the first half and a big lift in the interim dividend are reported by Hunting Gibson, the shipping group.

For the 1979 half year there was a profit of £1.95m, compared with a loss of £182,000 last time. And the interim dividend is hoisted from 0.1p to 6p.

	1978	1979
	£000	£000
Turnover	5,832	6,897
Profit	685	1,951
Associates	354	399
Profit before tax	1,039	1,182
Taxation	157	170
Net profit	882	1,012
Minorities	31	32
Preference dividend	15	15
Attributable	868	1,027
Losses:		

The directors say the results reflect the continuing improvement in the group's trading position and they consider this should be maintained progressively through the rest of the year. For the whole of 1978, the taxable surplus was £1.3m, with a total net dividend of 5.1p.

Half-yearly earnings per £1 share are given as 48.9p, against a 20.1p loss last time.

Turnover was down from £8.88m to £8.83m. The tax charge of £157,000 (£170,000) relates to associated companies' profits. No provision is made for UK tax because of the availability of tax allowances.

comment

Shareholders in Hunting Gibson have had a marvellous run this year on the back of the benefits

	Current payment	Date of payment	Corro. Div.	Total for year	Total last year
Ayrshire Metal	2	Nov. 12	1.71	—	5
Wm. Boulton	0.85	Dec. 6	0.73	1.35	1.22*
Edinburgh Inv. Trst.	1.1	Dec. 4	0.85	—	1.95
Freemans (London)	1.5	Dec. 6	1.05*	—	2.57*
Glaxo	6.0	Nov. 23	0.1	16	5.1
Hunting Gibson	6.0	Jan. 2	2.99	5.5	4.99
Maple	0.25	Nov. 30	—	—	0.75
Albert Martin	1.8	Jan. 3	1.88	—	4.13
William Pickles	0.2	Dec. 31	0.2	—	0.4
Reed Exec.	1.5	Dec. 3	0.9*	—	3.35*
Richard's (Leicester)	1.5	Nov. 26	1.5	—	4.25
Scottish Metropolitan	1.6	Jan. 7	0.98*	2.5	1.79*
Sarritte Eng.	1.45	—	1.25*	2.25*	1.68*
Woolstenholme Rink	2.5	Nov. 12	1.78*	—	5*

Dividends shown pence per share net except where otherwise stated. * Equivalent after allowing for scrip issue. On capital increased by rights and/or acquisition issues. † Total of not less than 2.45p forecast.

from the sale of "Tyne Bridge." Up from a low of 98p the shares had reached 317p towards the end of last week before coming back a little to 312p. But now that the group must be rated purely on trading grounds it is difficult to see how the price can maintain its recent cracking performance. Ship owning and management operations suffered a slight interim loss and should be back in a small profit for the full year. Industrial painting remains on a plateau and so much depends on the contribution from the broking division.

Here, rates have climbed by between 30 and 40 per cent while the level of activity has apparently increased by some 15 per cent and, with a better contribution in prospect from the 30 per cent-owned Hunting Petroleum Services and the travel associate there is plenty of scope to lift the final dividend. On no better than same again published first half earnings, the prospective p/e would be under 3 and estimates of the total distribution must start at 12p per share to indicate a minimum yield of 8.8 per cent.

Mersey Docks £2.2m deficit

INCLUDING £1.22m voluntary severance costs for the period, Mersey Docks and Harbour Company incurred a £2.21m pre-tax loss for the first half of 1979, against a £1.78m profit last time.

The group suffered a £1.47m loss for the whole of 1978 with a second half slump to £2.25m losses.

Sir Arthur Peterson, the chairman, says the results for the six months were badly affected by the road haulage strike, in January and February, and with other disputes the company had lost more than £2m of income.

The whole pattern of expenditure was being reviewed, he says. 500 employees left the company during the first half,

and further severance costs will be incurred in the second period, as efforts to reduce the labour force still further, are intensified.

Severance costs in the past 18 months have amounted to £4m.

"We are actively promoting the Port and are seeking new business, but taking account of present uncertainties both nationally and internationally, which affect our trading position, I cannot forecast that the results for the rest of the year will offset the losses in the first half," Sir Arthur states.

He added that current action, however, was establishing a firmer base for the future.

Included in the deficit for the six months was £2.8m (£2m) cargo handling losses, after overheads, interest and depreciation.

The chairman says the company has worked hard to recover from the early-year setbacks, and in increased throughput of general cargo has been achieved.

And although the number of containers was below expectations, the introduction of a freighter terminal at Royal Seaforth Dock early next year was expected to help the position.

Mersey Docks has agreed to lease the Smith Dock area to Merseyside District Council.

Operating revenue for the six months was little changed at £32.36m compared with £32.11m.

For the first time, a major European bank sets up a fully operational branch in Italy

BANQUE BRUXELLES LAMBERT

NEW IN MILAN

Since June 1979, the financial heart of Europe is also ticking in Italy.

Banque Bruxelles Lambert, the first Belgian bank to establish a fully operational branch in Milan, now offers services ranging from local to international, to help you develop your business in Italy, in Belgium, the EEC, and throughout the world.

Contact:

Robert Sorgeloo, Manager
Banque Bruxelles Lambert (Milan)
Piazza Castello, 28
20120 Milano - Phone: 8546
Telex 335364 - 335364 BABRU - I

Banque Bruxelles Lambert
banking, a matter of people

Marnixlaan 24, 1050 Brussel — Tel.: 02/513.81.81 — Telex 26392 BBLNL.

... big where it counts. The first major consortium bank's members have aggregate assets of over £57,800 million.

... small where it matters. Your business will be handled at senior level by experts who pride themselves on providing a fast, efficient and, above all, personal service.

... wide ranging and flexible. Whatever your particular need, MAIBL will tailor a financial package to meet it, whether it be the provision of working capital, project financing, leasing or restructuring debt.

... truly international. The scope of our services spreads throughout the world, so that we can assist you wherever you need our help in bringing your plans to successful fruition.

MIDLAND AND INTERNATIONAL BANKS LIMITED
26 Throgmorton Street, London EC2N 2AH.
Telephone: 01-588 0271. Telex: 885455.

Representative Offices in New York and Melbourne, Australia.
Subsidiary Company: MAIBL Bermuda (Far East) Limited, Hong Kong.

Member Banks: Midland Bank Limited; The Toronto-Dominion Bank Group; The Standard Chartered Bank Limited; The Commercial Bank of Australia Limited.

James Walker Goldsmith & Silversmith

Extracts from the Statement by the Chairman Mr. Gerald S. Sanders

The profits of the Group for the year under review exceeded those of the previous year.

The Balance Sheet of the Group at 30th April, 1979 shows once again the solid asset growth that we have enjoyed in recent years.

The Board has been actively engaged in negotiations for the acquisition of a number of successful businesses and we hope to bring these to conclusion before the end of the year.

The Board, wishing to keep the share capital of the Company in line with the capital assets employed in the Group, is recommending issues to the shareholders on the basis of 1 for 5. It is the intention of the Board, in the absence of any unforeseen circumstances, to recommend that the dividend be maintained at 3.5p per share on the share capital as increased by the capitalisation issues.

GROUP RESULTS FOR YEAR ENDED 30th APRIL

	1979	1978
Turnover	21,246,967	17,290,701
Profit before Tax	3,444,487	3,063,762
Taxation	1,598,318	62,091
Profit after Tax	1,846,169	3,001,671
Earnings per Share	11.293p	18.361p
Dividend per Share	3.5p	2.7996p
Dividend Cover	3.23 times	7.71 times

Copies of the Report and Accounts are available from the Secretary, James Walker Goldsmith & Silversmith Limited, Century House, Strandham High Road, London SW16 6ER.

حکومت الرشید

Companies and Markets

UK COMPANY NEWS

BIDS AND DEALS

Oil Exploration in merger talks

Oil Exploration (Holdings), the oil and gas concern, is in discussions with an unnamed party which could lead to an offer for the company's shares. On the Stock Exchange, the group's shares rose 6p to 482p.

There are a number of large shareholdings in the group. Atlantic Assets Trusts holds 51.4 per cent of the equity. Premier Consolidated Oilfields, 8.9 per cent, Viking Resources Trust, 8.3 per cent and British Assets Trust, 7.6 per cent.

Oil Exploration has been involved in offshore exploration in the UK sector since 1964 as a member of the Phillips Consortium. The group also conducts operations independently on the onshore and offshore areas. In the U.S. it has operating and non-operating interests in a number of mid-continent production leases.

In its last financial year ending December 31, 1978 it reported pre-tax profits of £1.6m on turnover of £4.99m.

On the Stock Exchange the group has a value of £62.8m.

BTR offer to Campbell & Isherwood

BTR, the rubber manufacturer, is buying Campbell and Isherwood, the electrical engineering group, in a 175p per share cash deal.

This places a value of £1.7m on the group. In addition BTR is offering 55p in cash for each preference.

Ellerman Lines, which controlled nearly 40 per cent of the equity has accepted the offer and together with the interests of certain directors and shareholders total acceptances amount to 507,890 shares (or 51.23 per cent of the equity).

The BTR deal is being effected through a subsidiary, Charlton Leslie Engineering.

Campbell and Isherwood has announced its results for the half year to June 30, 1979. Pre-tax profits were £118,000 compared with £226,000, on turnover of £5.98m.

Subject to the offer becoming unconditional, Campbell intends to pay an interim dividend of 5p. The group said yesterday that the lower trading profit reflects a continuation of the reduction in marine work and overall reduced profit margins resulting from increased costs.

COWIE HAS NEARLY 28% OF EWER

T. Cowie, the Sunderland-based car dealer, has added to its recently purchased 25.4 per cent stake in George Ewer, a coach operator and motor distributor.

It has bought a further 420,000 shares bringing its total holding to 4.9m shares (27.7 per cent). Its original stake of 25.4 per cent had been purchased in August for £1.84m.

LASKYS SALE APPROVED

Shareholders of Audiologic Holdings have approved resolutions for the sale of Audiologic (Retail)—the Laskys Hi-Fi chain—in Leadbroke Group.

Application has also been made by Audiologic to the Stock Exchange to resume dealings in the company's shares.

PANEL RULING UPHELD

The Takeover Panel has upheld an earlier ruling by its executive that, for the 12 month period before a bid is made, a net figure of share sales and purchases not obviously linked with offer is used to determine the level of the bidder's original holding.

The Panel was considering an appeal by Spillers against that earlier decision which had ruled that in calculating the number of shares in Spillers which Dalgety had acquired in the 12 months

before the commencement of the offer period, shares that had been sold more than four months before the announcement of the offer could be deducted from the number previously purchased.

ship owning, with the operational management contracted out to third parties, did not promise an adequate return on the funds invested.

Metcalf, incorporated in 1929, owns 14 general cargo vessels and operates in the spot charter market.

The terms of the purchase of the 250,000 ordinary shares of Metcalf are equal to £17.04 per share involving the issue of an appropriate amount of 10 per cent unsecured loan notes 1980.

Following a proposed 15 for 1 scrip issue, the bid will be £1.061 of loan notes for each share. Undertakings to accept the offer have been received by holders of 81.21 per cent of the Metcalf shares.

F. Lilley buys construction group in U.S.

F. J. C. Lilley, civil engineer and public works contractor, is to acquire 80 per cent of Harrison Western Corporation of Denver, Colorado, U.S., in a deal worth \$4.5m (£2.25m).

Consideration for the deal, which is subject to contract and certain conditions, is payable in cash, half on completion and half, without interest, over a three year period.

Assets of Harrison Western, a construction company operating principally in the mid-west of the U.S., amount to some \$4m and pre-tax profits averaged \$1.7m over the last three years.

Harrison has specialist skill and capacity in shaft sinking, mining development for mineral extraction, tunnelling and energy-related civil engineering works.

Lilley hopes that the new deal will provide it with further opportunities to develop its activities in the U.S. market.

ROSEHAUGH SHARES SUSPENDED

The listing of Rosehaugh Company shares have been temporarily suspended pending publication of reorganisation particulars.

HAWTIN

The acquisition of H. Sumner by Hawtin has been completed. A total of 500,000 new ordinary shares have been issued to the vendors.

William Boulton falls to £0.9m

WITH A downturn in the second six months, pre-tax profits of the William Boulton Group dropped from £1,369,896 to £902,696 for the year to June 30, 1979, and the directors warn that since the end of the period, a number of group companies have suffered from the recent disruption in the UK engineering industry.

They say, however, that it is not yet possible to quantify the effect this will have on the current year's results.

The group, which makes machinery for various industries and is involved in non-ferrous founding, general engineering and high duty ironmoulding, had increased first-half profits from £575,780 to £758,242.

Turnover for the year advanced from £20.22m to £24.16m, while profits were struck after higher depreciation of £274,501 (£229,336) and interest more than doubled from £207,116 to £453,559.

There was a tax credit of £38,129 (£492,095 charge).

A net final dividend of 0.85p effectively raises the total payment from 1.215p to 1.35p per 10p share.

BOARD MEETINGS

The following companies have notified dates of board meetings to the Stock Exchange. Such meetings are usually held for the purpose of considering dividends. Official indications are not available as to whether dividends are interim or final and the sub-divisions shown below are based mainly on last year's timetable.

TODAY

Interim—Associated Biscuit Manufacturers, Bankam Investment Trust, Barr and Wallace Arnold Trust, Bowdler, Farrell Electronics, Janga Shops, Lasey Products, M. F. North, Ruberoid, Sears Holdings, Senior Engineering, Slintbought, Finsley, Bejam, Canadian Overseas Packaging, Stothart and Pitt.

FUTURE DATES

Interim—Aberdeen and Bristol Channel	Oct. 15
Portland Cement	Oct. 15
Mellison-Denny	Oct. 30
Marks and Spencer	Oct. 15
McCleary L'Amis	Oct. 15
Must Holdings	Oct. 11
UBM (W. L.)	Oct. 17
Steel Brothers	Oct. 16
Telephone Rentals	Oct. 24
UBM	Oct. 15
Western Brothers	Oct. 19
Finnish	Oct. 19
Farview Estates	Nov. 19
MTV	Nov. 19
Kent (M. P.)	Oct. 10
Periton, Zochonis	Oct. 22

Amended.

W. Pickles profit fall

TURNOVER of William Pickles and Co., Manchester-based textile maker, rose slightly from £12.12m to £12.92m in the first half of 1979 but pre-tax profits were £237,781 compared with £316,806 in the same period last year.

Mr. D. S. Greensmith, chairman, says the result bears out his remarks at the last annual meeting that improved results this year based on the major reorganisation could not be expected.

However, the first half marks the beginning of the upward trend when account is taken of the phasing out of the temporary employment subsidy which has fallen from some £204,000 last year to £35,000 in the first half this year, the chairman says.

The reorganisation continues together with the investment plan to modernise production facilities and the marketing strategy to help in the creation of new merchandise aimed at a broader trading area.

While the results show an encouraging trend, they do not justify at present, an increase in the interim dividend. The interim is therefore held at 0.2p per share—last year the total was 0.4p from pre-tax profits of £400,000.

BOND WORTH

Bond Worth, the carpet manufacturer, whose joint receivers had reported a deficiency of over £17m, was compulsorily wound up in the High Court.

Mr. Justice Oliver made the order on a petition by Monsanto, bond creditors for £587,000.

Bond Worth was not represented at the hearing.

freemans

Mail Order
Interim consolidated financial statement for the 28 weeks ended 11th August 1979 (subject to the year-end audit)

£000's	28 weeks ended		28 weeks ended	
	11th August 1979	12th August 1978	27th January 1979	
Turnover	114,671	100,765	200,232	
VAT	8,851	7,130	14,216	
	105,820	93,635	186,016	
Trading Profit	7,972	7,500	17,249	
Interest Payable	169	292	502	
Profit before Taxation	7,803	7,208	16,747	
Taxation	4,058	3,748	8,856	
Profit after Taxation	3,745	3,460	7,891	
Dividends	1,045	728	1,781	

Dividend

The Interim Dividend is 1.5p per share (1978 1.05p), and will be paid on the 6th December, 1979 to shareholders on the register on the 9th November, 1979.

Comment

This year started badly, with an estimated loss of over £3m sales because of the delay in our receipt of catalogues and goods during the transport strike. It was hoped that it would still be possible to achieve the original targets by the end of the year, but this is now unlikely.

Considering the retail sales background during the summer the second catalogue has started reasonably well, but this is a particularly difficult season to forecast. Patterns in consumer spending have yet to settle from the change in relative prices brought about by the single rate of VAT introduced in June. There will be the benefit to spending power of the October tax rebates, but it is difficult to forecast how the present industrial relations climate may influence disposable income and its split between savings and consumer spending. In consequence, it is even more of a problem than usual to evaluate the likely profit outcome by the end of the year. Whilst we feel confident that the profit before taxation will exceed that earned last year, it is impossible at this stage to indicate by what amount.

8th October 1979
Anthony Rampton
Chairman

LOCAL AUTHORITY BONDS

Every Saturday the Financial Times publishes a table giving details of LOCAL AUTHORITY BONDS on offer to the public. For advertisement details please ring B. Kelaart 01-248 8000. Extn. 266

L.G. Index Limited 01-351 3466. Three months Sugar 146.45-148.25
29 Lamont Road, London SW10 0HS.

1. Tax-free trading on commodity futures.
2. The commodity futures market for the small investor.

CORAL INDEX: Close 485-490

INSURANCE BASE RATES

† Property Growth	131%
† Vanbrugh Guaranteed	122%

† Address shown under Insurance and Property Bond Table.

Why should a well-known company like Pioneer use an unknown bank like Pierson?

Our client Pioneer has been making quite a boom in audio equipment. We, however, have remained virtually unheard of.

Despite a century as successful Dutch merchant and commercial bankers.

Luckily, Pioneer heard of Pierson a decade ago. With our help they were the very first Japanese company to raise equity in Europe.

As Pioneer has grown, so have its ties with Pierson. More Japanese clients followed—Mitsui, Komatsu, Matsushita Electric, IDK—joining other internationals like Pechiney, Roffmans, Standard Brands.

Why do big names choose Pierson? Let's be honest, Pierson clients grow not because we offer different services from other wholesale banks. But because we're small and insist on high professional qualities. Which means we're more closely involved with your business. And more apt to discover inventive and original financial ideas for your growth.

Size doesn't limit our international capabilities. Our offices in the financial centers; our worldwide banking, legal, fiscal and accounting connections—as well as our international capital market experience and foreign exchange expertise—help our clients flourish in foreign markets.

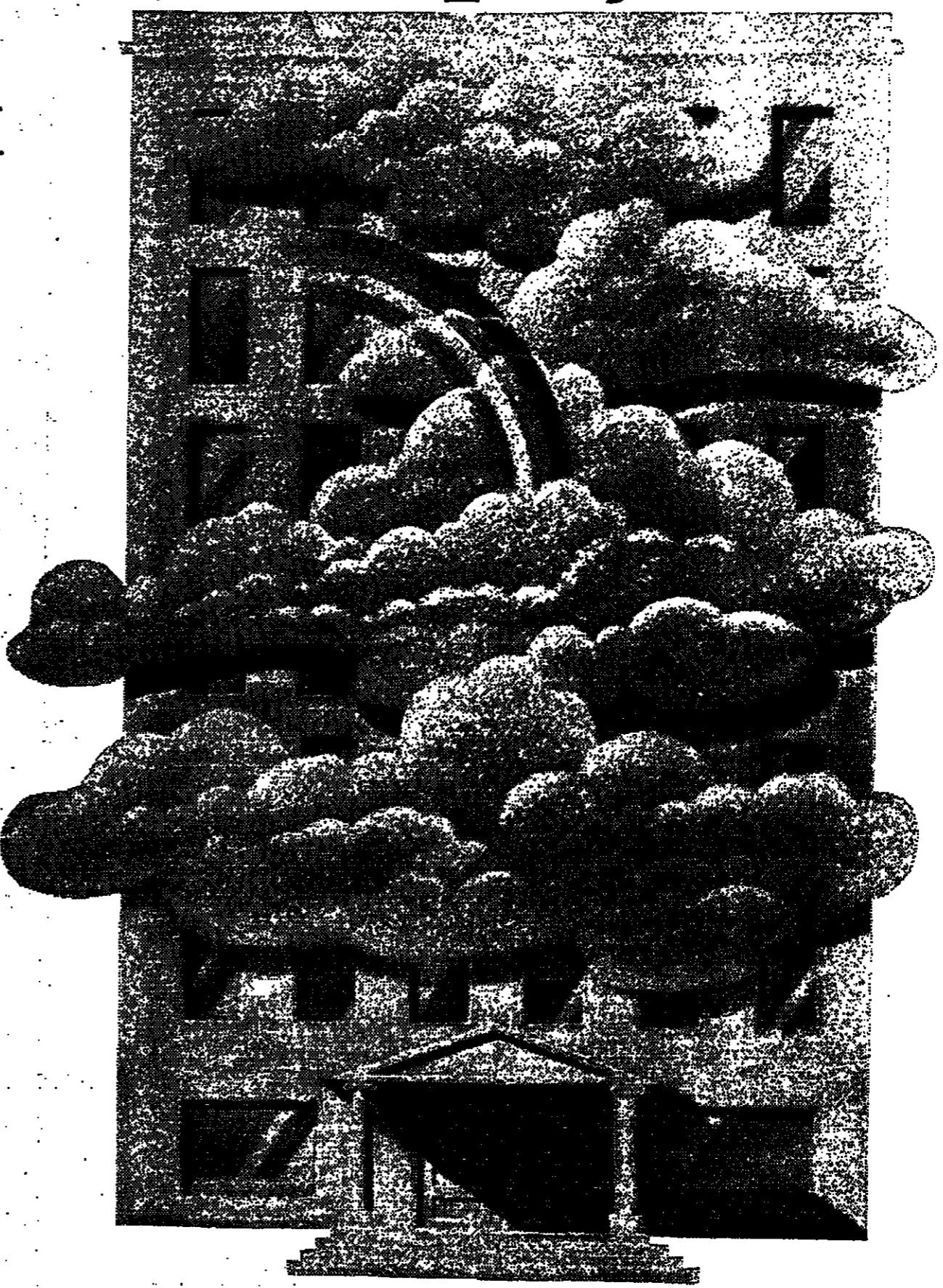
And there's another reason for companies to pick Pierson: Holland. A financial center with attractive conditions for international companies.

You're probably now asking yourself why Pierson—with so much to offer—is so unknown. Could it be that our clients simply aren't talking about us? Are they trying to keep us exclusively for themselves?

If so, let us enlighten you. Contact the closest Pierson or write for more information: Mr. Tom van Manen of our Marketing Department, 214 Herengracht, Amsterdam, The Netherlands.

PIERSON, HELDRING & PIERSON NV
Get to know the bank whose main service is service.

The Netherlands: Amsterdam (Head Office), The Hague, Rotterdam and Haarlem.
Foreign branches and subsidiaries, representative offices, trust offices and affiliates in: Bermuda, Curaçao (N.A.), Guernsey (Channel Islands), Hong Kong, Jakarta, London, Luxembourg, New York, San Francisco, Zurich and Tokyo.



A Texas Instruments Programmable.

$PV_x \left(\frac{i}{1-(1+i)^{-n}} \right)$

OR YOU CAN CALL UP THE PREWRITTEN PROGRAM CONTAINED IN THE MASTER LIBRARY MODULE, INCLUDED WITH THE TI-59 AND TI-59C, AND HAVE YOUR ANSWER IN SECONDS. "WHAT IF" SITUATIONS...

MATHS. STATISTICS. FINANCE. BUSINESS. ENGINEERING... AND MORE.

THE MASTER LIBRARY CONTAINS 25 PREWRITTEN PROGRAMS DESIGNED TO PROVIDE TODAY'S PROFESSIONALS WITH A "TOOL KIT" OF PROGRAMMED SOLUTIONS TO A WIDE VARIETY OF PROBLEMS.

PLUS IN PREPROGRAMMED MODULES, ARE AS EASY TO CHANGE AS A TAPE ON YOUR CASSETTE PLAYER. THEY MAKE COMPLEX BUSINESS DECISIONS OR SCIENTIFIC ANALYSIS AT YOUR FINGERTIPS AND YOU DON'T NEED TO KNOW COMPUTER PROGRAMMING OR ANY SPECIAL LANGUAGE TO PUT ONE TO WORK.

THE OPTIONAL PC-100C CAN TURN YOUR TI-59 OR TI-59C INTO A PRINTING CALCULATOR. IT CAN ALSO LIST, TRACE, PLOT CURVES OR HISTOGRAMS AS WELL AS PROGRAM HEADINGS.

OPTIONAL INTERCHANGEABLE PLUG-IN MODULES ARE ALSO AVAILABLE. EACH ONE CONTAINS A COMPLETE LIBRARY OF PREWRITTEN PROGRAMS. THEY ENABLE YOU TO CUSTOMISE YOUR CALCULATOR INTO A SPECIALTY PROBLEM SOLVER.

Now the TI-58C with constant memory. It stores program steps and data even when switched off.

If you're a professional or student you're involved in optimization, mathematical modelling, iteration, data reduction, what-if matrices or forecasts. If you have the time you work them out, or wait for the computer. Often you rely on intuition or estimates. Not any more. Now you can know. Because a programmable helps you cope with more data, explore with more insight. So you make better decisions, chosen from more options, from a broader data base.

Faster. On the spot. You can use it with the PC-100C printer too.

TI-58C Fully programmable up to 480 program steps/60 memories. Constant memory. **£9995** inc. tax.

TI-59 The world's most powerful hand held calculator with 960 program steps/100 memories. Can be used with magnetic cards to record custom programs, and selected programs in packets collected from TI-59 & TI-58 users. **£22995** inc. tax.

TEXAS INSTRUMENTS Always one step ahead.

Texas Instruments Limited, European Consumer Division, Maston Lane, Redditch, MK41 7YC, Tel: Redditch (0290) 67495

AMSTERDAM: De Willems; BRISBANE: BELFRY/DUBOIS; BUDAPEST: Magyar Bank; CALIFORNIA: L.D. MARR; CHICAGO: Andrew Oppenheimer; DUBLIN: J. J. O'Connell; GENEVA: J. J. O'Connell; HONG KONG: J. J. O'Connell; LONDON: J. J. O'Connell; LYONS: J. J. O'Connell; MADRID: J. J. O'Connell; MANCHESTER: J. J. O'Connell; MILAN: J. J. O'Connell; MUMBAI: J. J. O'Connell; NEW YORK: J. J. O'Connell; PARIS: J. J. O'Connell; ROME: J. J. O'Connell; SINGAPORE: J. J. O'Connell; SYDNEY: J. J. O'Connell; TOKYO: J. J. O'Connell; WASHINGTON: J. J. O'Connell; ZURICH: J. J. O'Connell.

MINING NEWS

GFSA gold profits at record level

BY PAUL CHEESERIGHT

WORKING PROFITS for the major gold producers in the Gold Fields of South Africa group reached record levels in the September quarter as the benefits of the strong bullion price continued to boost income.

The latest figures from the group's mines, published this morning, show that on average the mines were receiving about \$310 an ounce for their gold, compared with \$260 in the June quarter and \$240 in the March quarter.

Overall, net profits at the mines in the September quarter were R109.1m (£60.3m), an increase of 21.5 per cent on the R89.8m earned in the previous quarter. Working profits were in fact 28.7 per cent higher, but a rise of 34 per cent in taxation and the state's share of the profits eroded the net level of earnings.

But it is likely that the September quarter earnings will be only a foretaste of even higher profits in the December quarter. With the time lag between the surge in international bullion prices and the receipt of a price

for the mined gold, the producers will not so far have received much gain from recent market movements.

The bullion price passed through \$350 an ounce in mid-September, and despite sharp fluctuations, has not returned to that level.

The level of net profits at the individual mines was:

	Sept. '79	June '79	March '79
	at R000s	at R000s	at R000s
Deepest	5,754	5,401	4,900
East Driefontein	56,715	50,851	28,259
Kloof	20,447	18,918	14,036
Libson	6,320	5,985	4,894
Venterpost	2,010	1,831	1,102
Witwatersrand	406	407	330
West Driefontein	36,951	29,442	27,144
After receipt of State aid			
State aid repayments			

The most striking increase in profits was at Venterpost, where a rise of 142 per cent enabled the company to shrug off the necessity for state assistance. Although this rise reflects the recovery of operations after a fire in the June quarter, it also shows the effect of the higher bullion price on a marginal producer.

At the other end of the scale, the rise in Doornfontein profits was just 6.5 per cent as the top bill and state's share of the profits went up to R7.53m in the September quarter from R4.15m in the June quarter.

Net profits at West Driefontein, the biggest producer in the group, rose 25.5 per cent and of East Driefontein by 19 per cent. But both mines worked lower grade ore, a characteristic move at a time of high prices. At Kloof and Libson, however, the same grade of ore as in the June quarter was mined.

Over the whole group, the effect of mining a lower grade rate, which meant that GFSA's total gold production rose to 41,263 kg in the September quarter from a June quarter total of 41,133 kg.

Significantly this higher level of production has been achieved with only a small increase in production costs, 1.8 per cent over the quarter and 4.8 per cent over the past 12 months, suggesting that at least in this respect the worst is over for the mines.

UM income increases

THE OUTLOOK for the rest of this year is leading Union Miners, the Belgian mining and investment group, to predict better results than in 1978 when net profits were BFr 478.9m (£7.7m).

During the first half operating results were improved, owing to increased metal sales, and investment income was higher than in the comparable period of 1978, the group said yesterday.

This opens up the possibility of higher dividends, thus halting the slide in payments which started in 1975. An immediate beneficiary would be Teuku Consolidated Investments, which holds 17.8 per cent of UM and last week announced reduced net income for the 1979 first half.

Production from the Thierry copper mine in Canada is continuing at a reduced rate, but an improved copper price and much higher revenue from precious metals "made it possible to cover an appreciable part of the normal amortisation," UM said.

The group's new electrolytic zinc plant at Clarksville in the U.S. has overcome the time-up problems encountered at the start of operations last November, but low zinc demand is still weighing heavily on the group.

UM's expansion plans in the U.S. have been checked by a decision to suspend all further work at the Oracle Ridge. The group is having talks with its partners about adapting a programme which was set up on the basis of what are now seen as false estimates of the size of the deposit.

Tanks Consolidated shares were unchanged yesterday at 180p.

More copper at Olympic Dam

FURTHER EXTENSIONS of the large Olympic Dam copper-uranium discovery in South Australia and further high grade intersections at Central Norseman, south of Kalgoorlie, Western Australia, have been revealed by Western Mining Corporation in its latest quarterly report, writes James Forth from Sydney.

Only two intersections of mineralisation, in holes RD 22 and RD 24, at Olympic Dam were mentioned in the September quarterly statement. The significance of the results is the distance apart of the holes, rather than the assays which are in line with previous results.

Hole RD 22 is 600 metres east of RD 20, while RD 24 is 1600 metres south of RD 20. This means that mineralisation has now been encountered over several miles in both north-south and east-west directions. It is understood that no major breaks in mineralisation have been located.

The report noted that British Petroleum's proposal, announced in July, to buy a 49 per cent stake in Olympic Dam has been agreed by the South Australian state Government, but still awaits approval from the Commonwealth Government.

Meanwhile Central Norseman, which is 50.5 per cent owned by WMC, has continued to find rich intersections at Mirrora Reef, south of its existing workings. Of the two holes reported, one intersected 0.5 metres yielding 58.1 grams of gold a tonne at a depth of 220 metres and the other 39.6 grams a tonne at a depth of 128 metres.

In its June report, Central Norseman reported a strike of 49.4 grams of gold over 2 metres and another of 11 grams over 1.75 metres. The high grade discoveries compare with the company's existing reserves of 445,000 tonnes, averaging 17.6 grams of gold a tonne.

In London yesterday WMC shares were unchanged at 187p.

tonnes—well ahead of the 453 tonnes produced in the comparable period last year.

Berjant managed a modest increase in output in September but the five months total of 1,582 tonnes is lagging well behind the 1976 tonnes produced in the same period last year.

In the September outputs of the Gopeng group production at Pengkalen fell for the third successive month but the 12 months total of 240 tonnes is more than double the 104 tonnes produced in the year to September 1978. Production figures for both groups are detailed in the accompanying tables.

	Sept.	Aug.	July
	tonnes	tonnes	tonnes
Aokam	187	167	136
Ayer Hitam	198	118	204
Berjant	321	227	226
Kamunting	50	47	51
Kramat	—	—	—
Kualu Kampar	20	22	38
Lower Perak	14	20	18
Malayan	280	327	336
S. Kinta Cons.	162	170	153
Sib. Malayan	182	126	165
Sungei Basi	168	128	189
Tonkiah Harb.	44	48	37
Tromoh Mines	193	187	194
Gopeng Group			
	Sept.	Aug.	July
	tonnes	tonnes	tonnes
Gopeng	182	182	157
Tanjong	18	20	19
Idris	20	20	20
Panokajen	19	33	42

Subject to sales keeping pace with output, he added, this side of the business might well prove to be the group's front runner this year as far as profits were concerned.

Because of the success of the tube operation, the achievements this year of the scrap processing division might be somewhat overshadowed, he said, but nevertheless that too should produce good profits and continue to do so indefinitely.

As already announced, profits for the year rose to £458,282 from £212,991 on turnover up from £7.7m to £12.5m.

Continuing good profits forecast at Braswary

The tube division of Braswary is performing extremely efficiently, having overcome the production problems of last year, said Mr. R. A. Swaby, chairman, at the annual meeting.

Subject to sales keeping pace with output, he added, this side of the business might well prove to be the group's front runner this year as far as profits were concerned.

Because of the success of the tube operation, the achievements this year of the scrap processing division might be somewhat overshadowed, he said, but nevertheless that too should produce good profits and continue to do so indefinitely.

As already announced, profits for the year rose to £458,282 from £212,991 on turnover up from £7.7m to £12.5m.

To manage international finance for a company as diversified as Brazil's CAEMI, a man must be both talented and tireless.

His banker must be the same.



Robert M. Londono, Vice President, Chemical Bank. Photographed at the shipping terminal of CAEMI's subsidiary Mineracoes Brasileiras Reunidas S.A.

In Brazil, CAEMI stands for Companhia Auxiliar de Empresas de Mineracao. In the rest of the world, it stands for a worldwide organization with financial interests in five major areas—mining and exploration, raw materials for the steel industry, chartering, general commodities, and food products.

In a company that is diverse and far-flung, Finance Director Vinicius Ferraz Machado must try to be everywhere at once attending the money needs of many subsidiaries in many currencies. Fortunately, he can turn for help to a man who can put him in

touch with the world. His Chemical banker, Bob Londono.

Londono operates out of Chemical Bank in New York, but with Chemical's physical presence around the globe, he can help Machado everywhere CAEMI does business. In Brazil, Chemical Bank services CAEMI through its representative offices in Rio and São Paulo. In Europe, Chemical finances CAEMI's operations out of full-service branches in London and Brussels. And in New York, it assists with CAEMI's increasingly numerous joint ventures with major U.S. companies.

Considering its worldwide status and international activities, CAEMI is a company that requires considerable short- and medium-term financing. In addition to that financing, Machado will tell you that Londono gives him something else that's equally important. And that's a professional and personal relationship rare enough in any line of business.

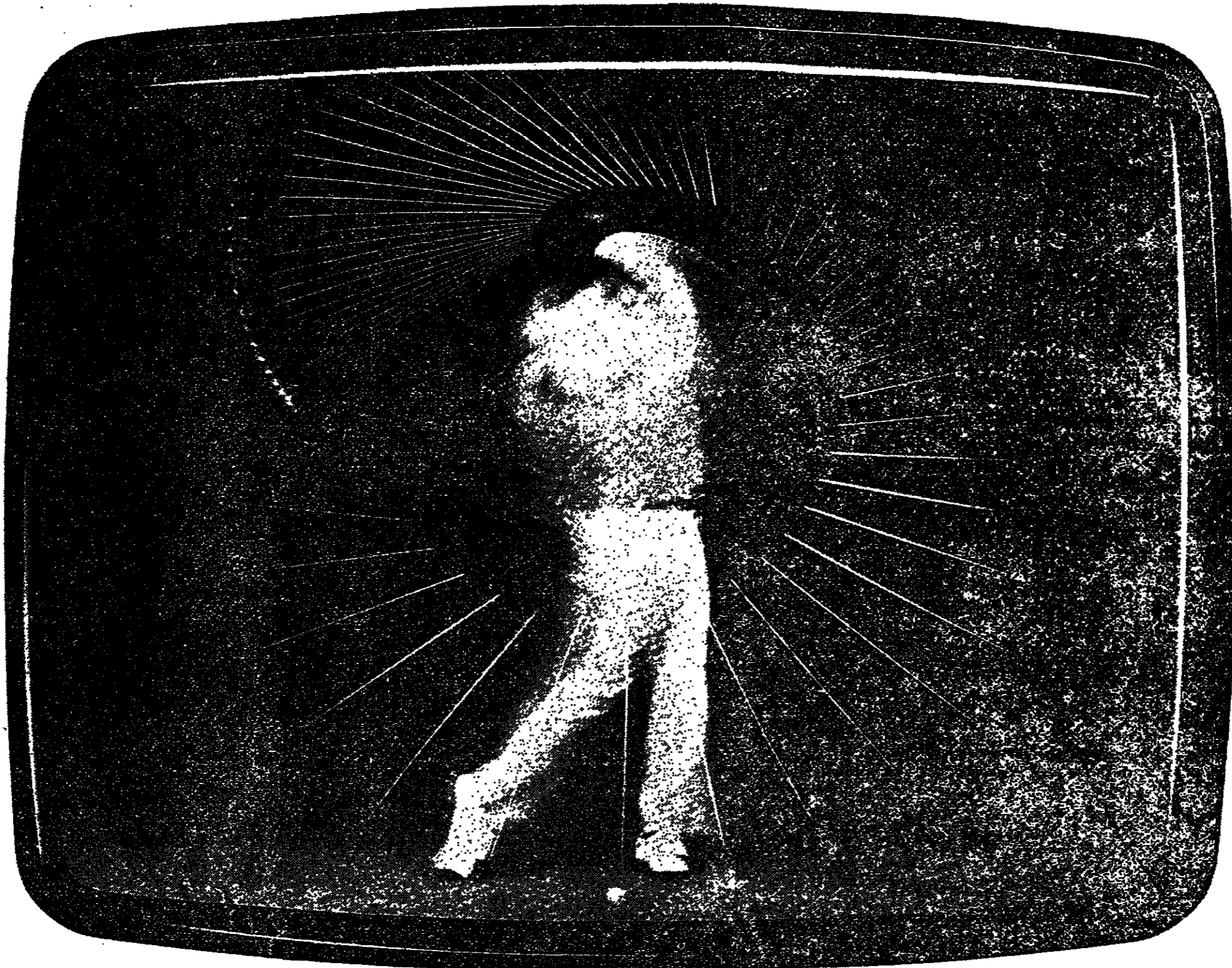
That's what usually happens when corporate officers get together with Chemical Bankers. And what results is bottom line benefits for both the company and the bank.

The difference in money is people. **CHEMICAL BANK**

Chemical Bank House, 180 Strand, London WC2R 1ET Tel: 379 7476 Representative Offices: Scottish Provident House, 3-2 Waterloo Street, Birmingham - Charlotte House, 17 Charlotte Square, Edinburgh. Main Office: New York, N.Y. Our Worldwide Network: Abdijan, Bahrain, Bangkok, Beirut, Birmingham, Bogota, Bombay, Brussels, Buenos Aires, Cairo, Caracas, Channel Islands, Chicago, Dubai, Edinburgh, Frankfurt, Hong Kong, Houston (Interstate), Jakarta, London, Madrid, Manila, Mexico City, Milan, Moscow, Nassau, Paris, Rio de Janeiro, Rome, San Francisco, Sao Paulo, Seoul, Singapore, Sydney, Taipei, Tehran, Tokyo, Toronto, Vancouver, Vienna, Zurich.

مكازم التاجيل

The quick-frozen birdie.



Panasonic's new video cassette recorder could be the best thing that ever happened to your golf game.

A whole "sudden death playoff" easily fits one three-hour cassette. And when you play it back, you can "freeze" the picture while you analyse the master's stance. Then follow his swing through, frame by frame, at the touch of a button.

Naturally, this kind of precision calls for a very special recording system.

The Matsushita group's VHS, born of our unique experience in the audio/video field, is such a system. That's why VHS has been chosen by most of the big names in TV. Here in Europe and in the USA.

Panasonic is part of Matsushita Electric—Japan's biggest consumer electronics group. And Technics, whose direct-drive turntables and tape decks are legendary examples of hi-fi technology, is a sister company.

So it's no wonder the NV-8610 gives you a superb picture plus adequate recording time. That the video cylinder motor is quartz-locked and direct-drive. Or that the chassis is die-cast aluminium, instead of a flimsy stamping.

You can record off one channel while you watch another. Use the remote control to edit out commercials and "freeze" the pictures from across the room.

And the built-in clock/timer can be preset to make a tape up to a week after you've left home. So the big match will be ready waiting for you when you get back from your summer holiday.

There are connections for a mike and a tape deck. Letting you put live commentaries or music tapes onto the VHS cassette.

Add our portable video camera and family events like Christmases and birthdays will become a treasured part of your video cassette library.

Trust Panasonic to get you into the swing of things.



Home Video Recorder



NV-8610

National Panasonic

Panasonic and National are the brandnames of Matsushita Electric.

TV picture simulated. Recording and playback of material may require conversion. See Copyright Act 1956 and the Patents Act 1956-1972.

Albert Martin falls to £0.45m in first half

FIRST HALF profits of Albert Martin Holdings, clothing manufacturer, were down from £524,000 to £460,000 and the directors now feel it would be realistic to expect profits this year only similar to the £1.24m achieved in 1978.

As stated in the last annual report, 1979 is proving a difficult year to forecast, particularly in view of the uncertainty of retail demand in the UK together with problems in export markets created by major movements of sterling against other currencies.

However, the Board is convinced that the group's expansion policies are providing a strong base from which full advantage can be taken of any upturn in trade.

The interim dividend is being raised from 1.675p to 1.8p—the total last year was 4.1275p.

The group has continued with its extensive capital expenditure programme in the UK and some £1.25m will be invested this year, principally in constructing and equipping some 78,000 sq ft of additional factory space.

comment

Albert Martin is going through a capital spending hump this

year and the attendant rise in debt financing costs has undermined the trading improvement to the extent that interim pre-tax profits are 14 per cent down. Sales to Marks and Spencer are worth 47 per cent of the interim total—clearly the success of the retail group's price cutting offensive will weigh heavily on Martin's second half profitability. For the moment, the message is that higher volume has offset the impact of static prices. With the benefit of income tax rebates this month, the recent upturn may be enough to hold pre-tax profits this year and, although there is no likelihood of a mainstream liability, the fully taxed p/e on this basis would be 7. Despite a 2p rise yesterday to 87p, the shares are still bumping along near the year's low but there may be a case for some re-rating. A 7 1/2 per cent rise in the gross final dividend suggests a prospective yield of 10.2 per cent. But Martin's merits should be rather more clear cut next year when the interest burden starts to ease and, above all, when the effects

of St. Michael's sales campaign can be appraised.

Startrite improves to £0.68m

WITH TURNOVER better at £3.71m against £4.96m, taxable profits of Startrite Engineering Group moved ahead from £338,719 to £581,474 for the year ended June 30, 1979.

When reporting first-half profits up from £214,440 to £240,370, the directors expected that full year results would compare favourably with the previous year.

Stated yearly earnings per 20p share gained 1.48p to 26.48p, while on capital increased by the one-for-one scrip issue approved yesterday, a net final dividend of 1.45p effectively lifts the total to 2.25p (1.948p).

Tax took £282,763 (£260,401) including transfer to tax equalisation account. The retained surplus emerged at £300,023, of which £50,000 is the transfer to tax equalisation account.

Maple expects buoyant year

PROFITS before tax of Maple Co. (Holdings), furniture and furnishings retailer, rose from £308,000 to £526,000 in the 23 weeks ended August 18, 1979 and the directors expect a satisfactory improvement in profits over the £1.03m achieved last year.

The board also announces the acquisition of 92 per cent of Armana, whose principal business is a substantial furniture store in the centre of Nice, France. The purchase, costing about £734,000, will be mainly financed by a medium-term Euro-France loan.

Maple's turnover for the 25 weeks increased from £11.24m to £14.17m. All stores showed an encouraging increase and the Tottenham Court Road branch opened in September 1978 is trading very successfully, the directors say.

However, the strength of sterling has reduced the comparative turnover for France, they add. An interim dividend of 0.25p is declared for the year and returned to shareholders after a four-year absence, with a single 0.75p.

Profit is after interest of £212,000 (£208,000) but before

overseas tax, £38,000 (£48,000), and UK tax £33,000 against £19,000. There are also extraordinary credits of £32,000 (£7,000).

Total consideration for the acquisition, payable in cash, will be equivalent to 92 per cent of Armana's net asset value based on an audited balance sheet to be drawn up as at October 31, 1979, including at Healey and Baker's valuation the Nice property. The total consideration will amount to about FFr 6.5m payable in instalments, the final sum of FFr 1m on Nov. 1, 1982.

Directors are of the opinion that the store should be capable of achieving profits in the order of £200,000 per annum at present rates of exchange in the foreseeable future.

At present, Armana operates four stores but only the store in Nice will be acquired. The other three stores will be disposed of by Armana prior to the acquisition by Maple.

The board intends to continue the policy of broadening the group's international base by acquiring further businesses overseas when suitable opportunities arise.

Wolstenholme Rink to consolidate this year

STRUCK after an increased copper account adjustment of £172,312, compared with £17,063, taxable profits of Wolstenholme Rink fell from £215,868 to £90,090 for the first half of 1979. Turnover was some £1m higher at £7.9m.

Mr. Alan Green, the chairman, says all group companies have started the second half with increased turnover, although only marginally at the principal subsidiary, Wolstenholme Bronze Towers.

He anticipates that full-year results will not be far away from the 1978 profits and adds that it will be a year of consolidation, rather than the rapid growth of the previous two-year period.

Last year, pre-tax profits advanced from £1.4m to a record £1.88m. Tax charge for the six months was £285,086, against a restated £286,228, giving net profits down from £639,740 to £616,004.

The net interim dividend is effectively raised from 1.785p to 2.5p per 25p share, absorbing £132,474 (£83,481), and the Board expects to recommend a final of not less than 3.25p making a total of 5.75p—a 15 per cent increase over the previous year's 5p equivalent.

In the half-year, volume sales of Wolstenholme Bronze were at a similar level to the same period of 1978. The company is heavily involved in export markets and the steep and sudden rise in sterling value created considerable problems.

Strong efforts are being made to bring down unit costs in order to make exports more competitive and the chairman reports that despite rising costs, some success is being achieved.

There was a steady improvement in sales at Charles Openshaw and Sons (Manchester). But with exports a substantial part of its turnover, it was not able to achieve a corresponding increase in profit, due to margins being squeezed between the strong pound and rising costs. Some of the extra costs are in more personnel to cover a wider geographical area.

Other subsidiaries achieved steady increases in turnover and profits, particularly at S. Fry and Co. benefitting from its reorganisation, and H. H. Edinger and Co. which maintained its profit margins.

The group is engaged in the production of bronze and aluminium powder and merchandising of pigments and chemicals.

Scottish Metropolitan beats its forecast

COMPARED WITH the £185m forecast made in May at the time of the rights issue, profits before tax of Scottish Metropolitan Property Company jumped from £1.27m to a record £2.01m for the year ended August 15, 1979. Net revenue from properties increased from £2.94m to £3.61m.

First-half profits were up from £538,995 to £809,042 and the directors anticipated then that the full year's figure would be materially in excess of the previous year.

Yearly after-tax earnings per 20p share are shown as 3.22p (2.09p) basic and 2.81p (2.2p) fully diluted, as forecast in May, a net final dividend of 1.6p effectively lifts the total payout from 1.7935p to 2.5p per share. The directors intend to pursue a progressive dividend policy in line with earnings growth.

Investment income and interest received rose from £241,045 to £364,016, while interest charges and administration expenses took £1.7m (£1.69m) and £256,577 (£215,116) respectively. Tax charge increased from £871,560 to £902,297 and available revenue emerged at £1.11m (£787,251) with the comparative result adjusted for the transfer of £87,100 from reserves relating to development programme.

The policy of making such a transfer has been discontinued for the 1978-79 year, but a corresponding transfer would have amounted to £75,700, which would have accordingly increased the available result.

Book value of properties reached £64.73m (£61.84m) and capital and reserves were up from £40.7m to £48.32m.

yield is based on the last two distributions after expenses and reflects current high interest earned on cash deposits.

The trust has recently completed the purchase of a 190 acre arable farm in Lincolnshire, let on a single full repairing and insuring tenancy agreement. The purchase of a further let farm of 240 acres in Scotland is now under contract.

Reduced loss at Levers Optical

Losses of Levers Optical Company, maker of optical goods, fell from £63,360 to £28,681 for 1978. The board states that while it is still intended to apply for a quotation on the Stock Exchange in the near future, there was a tax charge of £1,034 against £452, and an extraordinary debit of £11,032 (£30,158).

While there has been a payment on the preference shares this year, there is again no dividend payable on the 25p ordinary shares. The last payment was 1.20829p net in 1975.

Midway jump at London Pavilion

Profits of London Pavilion, theatre and cinema manager, jumped from £19,001 to £36,052 in the first half of 1979, before tax of £15,258, against £5,149.

For the whole of last year, the taxable surplus recovered from a depressed £3,553 to £56,821.

All expenditure relating to the redevelopment of the London Pavilion up to June 30, 1979, totalling £107,413, has been approved by the Board and is included in fixed assets. No further expenditure will be approved until full planning permission has been obtained.

The directors say there is a liability for professional fees incurred in connection with the redevelopment of the London Pavilion. The amount is not yet quantifiable and the Board believes it unlikely it will be paid in the near future.


AGRICULTURAL PROPERTY ISSUE

The Pension Fund Agricultural Property Unit Trust is making a new issue of units at a net subscription price of £1,310 to yield approximately 3.7 per cent. This

This announcement appears as a matter of record only.

Perforaciones Maritimas Mexicanas S.A.

a member of
Grupo Protexa
Mexico



US\$ 23,000,000

Medium Term Credit

for the purchase of the offshore jack-up rig 'MAYA'

Managed by
Libra Bank Limited **The Valley National Bank of Arizona**

Provided by
Bancomer S.A. **The Chase Manhattan Bank, N.A.**
Libra Bank Limited **Provident National Bank**
The Valley National Bank of Arizona

Agent Bank
LIBRA BANK LIMITED

This announcement appears as a matter of record only.




NUOVI CANTIERI APUANIA S.p.A.

U.S.\$23,100,000
Medium Term Project Financing

Guaranteed by
SOCIETA DI GESTIONI E PARTECIPAZIONI INDUSTRIALI S.p.A.

Arranged and Managed by
Bank of Tokyo and Detroit (International) Limited
First International Bancshares Limited

Co-Managed by
Bank of Montreal
Midland and International Banks Limited
Wells Fargo Limited

Provided by
Banca Nazionale del Lavoro (London Branch)
Bank of Montreal
Bank of Tokyo and Detroit (International) Limited
First National Bank in Dallas
Midland and International Banks Limited
National Bank of Detroit
The Bank of Yokohama Limited
Wells Fargo Bank, N.A.

Agent
First National Bank in Dallas

October 3, 1979

Jovan, Inc.

has been acquired by a wholly-owned subsidiary of

Beecham Group Limited

The undersigned acted as financial advisor to the principal shareholders of Jovan, Inc. in connection with this transaction and assisted in the negotiations.

Salomon Brothers

One New York Plaza, New York, New York 10004
Atlanta, Boston, Chicago, Cleveland, Dallas, Hong Kong, London (subsidiary), Los Angeles, Philadelphia, San Francisco
Members of Major Securities Exchanges.

Parker Knoll Limited

12 months to 31st July	1979	1978
	£'000	£'000
Group sales	23,191	19,798
Profit before tax	2,526	1,728
Earnings per share	19.4p	12.6p
Dividend per share	5.0p	2.401p
Net assets per share	168p	92p

Points made by the Chairman, Mr. M. H. T. Jourdan

- ★ Profit up 46%.
- ★ Increased range of activities.
- ★ Confidence in the future.

WESTERN MINING CORPORATION LIMITED

To the Holders of:
U.S. \$18,000,000 9 1/2 per cent. Notes 1982 (the "Notes")
and
U.S. \$50,000,000 9 per cent. Bonds 1992 (the "Bonds")

Further to the notice to holders of the Notes and the Bonds which appeared in the Financial Times on 6th April, 1979, the Board of Directors of Western Mining Corporation Limited (the "Corporation") announces that on 9th October, 1979 the Corporation sent to its shareholders, pursuant to an Order of the Supreme Court of Victoria, a notice of meeting to be held on 9th November, 1979 for the purpose of considering and, if thought fit, approving a Scheme of Arrangement under which Western Mining Corporation Holdings Limited ("Holdings") will become the parent company of the Corporation.

The Law Debenture Corporation, Limited as Trustee for the holders of the Notes and the Bonds has, pursuant to its powers under the Trust Deeds constituting the Notes and the Bonds, entered into two Supplemental Trust Deeds under which, inter alia, Holdings has agreed to guarantee the obligations of the Corporation under the original Trust Deeds and to enter into certain further covenants. These Supplemental Trust Deeds will only become effective on the Scheme of Arrangement becoming effective. It is expected that the Scheme of Arrangement will become effective on or about 18th November, 1979. Copies of the Supplemental Trust Deeds and the Scheme of Arrangement are available for inspection by holders of the Notes and the Bonds at the specified offices of the Paying Agents.

A further notice to holders of the Notes and the Bonds will be given when the Scheme of Arrangement becomes effective.

DATED 9th October, 1979.

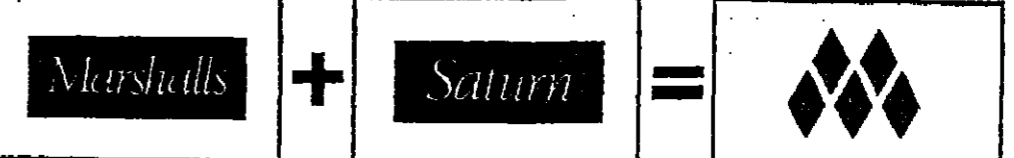
WESTERN MINING CORPORATION LIMITED

The whole is greater than the sum...

M. W. Marshall is the money broking division of the Mercantile House Group.

Saturn Holdings, with its subsidiary and associated companies, provides services in related financial markets.

Mercantile House Holdings is the whole, of which Marshalls and Saturn are the two operating parts.



Marshalls is a leader amongst international money brokers, with offices in London and 12 financial centres around the world.

Saturn's services include equipment leasing consultancy and asset management and also money management through the SIMCO funds.

Mercantile House is an international group providing a wide range of complementary financial services to customers throughout the world.

Mercantile House Holdings Limited

66 Cannon Street, London EC4N 6AE. Telephone: 01-236 0233

مركز التحليل

92% failure!

That's the finding of a recent Government Survey into British industry's adoption of the microprocessor. Only 8% of British firms have so far taken action to implement micro-technology into their business compared with two and three times that in the US and Japan. Britain needs to catch up fast, and for go-ahead companies there's a real opportunity still, to make capital out of the microprocessing 'revolution'.

Three days to get ahead. Finding out how microtechnology can really help your company needs taking. IIST - an independent educational foundation with centres in New York, Toronto, Paris, Luxembourg and London - provides comprehensive instruction and practical assistance to industry and commerce.

Microcomputer to keep. Delegates to IIST courses see for themselves how micro can be used. On all but the introductory application course they work with their own microcomputer which, together with all manuals, course workbook and a computer program cassette is theirs to keep.

Who Should Attend. Detailed knowledge and experience of computers or technology is not necessary for two day courses. For the Microprocessing Fundamentals course a technical or scientific background is an advantage. Those with classical or scientific backgrounds are particularly relevant - such as process industries - will find the Application to Process Control course invaluable in catching up with world-wide developments in their field.

Previous delegates have come from such well-known organisations as IBM, Esso, Ford, Price Waterhouse, Rank, Xerox, Rolls-Royce, Shell, the Ministry of Defence, and a host of small and medium-sized firms. Ring now to book your place on an IIST course.

Table with 2 columns: Date and Course Programme. Lists various microprocessing courses from October to December 1979.

All the above courses (except Microprocessing Fundamentals at the Kensington Palace Hotel) will be held at the Kensington Hilton Hotel in London. Coffee, lunch and afternoon tea are included. Reservations and further details of these and later courses from London Registrar.

International Institute of Science and Technology, 33 Warren St, London W1P 5DL. Tel: 01-886-4865/887-1135.

Advertisement for Baume & Mercier watches. Features an image of a watch and text: 'Elegance in time... BAUME & MERCIER GENEVE 1830'. Includes details about the watch's features and where to purchase it.

Table titled 'HAWTIN LIMITED INTERIM STATEMENT'. Shows financial results for the six months ended 31 July 1979, comparing 1979 and 1978 figures for turnover, profit, and dividends.

Advertisement for Boustead Limited. Features the text 'Boustead Limited OVERSEAS TRADERS INTERIM REPORT 1979' and a table of financial data for 1978 and 1979, including turnover, profit, and dividends.

UK COMPANY NEWS

S. Lyles nears £1m

A SECOND-HALF rise from £285,718 to £509,968 has lifted taxable profits of S. Lyles, carpet yarn spinner and dyer, from £282,790 to £506,848 for the year ended June 30, 1979. A £1.3m peak was reached in 1973/74. Mr. John Lyles, chairman, states that trading conditions during the second six months enabled the company to complete a year of high activity, and he says that so far in the current year they show no signs of abating.

Richards (Leics.) slumps

ON TURNOVER little changed at £2.86m against £2.71m, pre-tax profits of Richards (Leicester) slumped from £245,000 to £28,000 for the half-year ended July 1, 1979. And Mr. T. L. Plewman, the chairman, feels it impossible to forecast the results for the full year. Profits for the whole of 1978 fell from a record £861,000 to £525,000.

Gold Fields Group

SEPTEMBER QUARTERLIES

Table for BOORFOONTEIN GOLD MINING COMPANY LIMITED. Shows operating results, financial results, and development details for the quarter ended 30/9/1979.

Table for WEST BRIEFORTHEIN GOLD MINING COMPANY LIMITED. Shows operating results, financial results, and development details for the quarter ended 30/9/1979.

Table for DEELKRAAL GOLD MINING COMPANY LIMITED. Shows operating results, financial results, and development details for the quarter ended 30/9/1979.

Table for EAST BRIEFORTHEIN GOLD MINING COMPANY LIMITED. Shows operating results, financial results, and development details for the quarter ended 30/9/1979.

Table for VENTERSPOST GOLD MINING COMPANY LIMITED. Shows operating results, financial results, and development details for the quarter ended 30/9/1979.

Table for LIBANON GOLD MINING COMPANY LIMITED. Shows operating results, financial results, and development details for the quarter ended 30/9/1979.

Table for KLOOF GOLD MINING COMPANY LIMITED. Shows operating results, financial results, and development details for the quarter ended 30/9/1979.

Table for VLAKFOONTEIN GOLD MINING COMPANY LIMITED. Shows operating results, financial results, and development details for the quarter ended 30/9/1979.

Table for SIBURG REEF. Shows operating results, financial results, and development details for the quarter ended 30/9/1979.

Table for KIMBERLEY REEF. Shows operating results, financial results, and development details for the quarter ended 30/9/1979.

NOTE: Copies may be obtained from the United Kingdom Registrar: Close Registrars Limited, 803, High Road, Leyton, London, E10 7AA

U.S. EUROMARKET SQUEEZE

Banks worried and confused

BY JOHN EVANS

THE RE-IMPOSITION of marginal reserve requirements on the Eurodollar repatriation of U.S. banks...

Some American banks which have been extending international credit partly or wholly from a domestic base...

The Fed in August last year reduced from 4 per cent to zero the requirement on the foreign borrowings of its member banks...

Uniroyal attributed the third quarter deficit to pricing problems in the U.S. replacement tyre business...

Uniroyal forecasts \$10m third quarter loss

By Our Financial Staff

UNIROYAL, the fourth largest tyre and rubber producer in the U.S., expects to post a \$10m loss for the third quarter...

FLIGHT INTO DOLLAR

Mexico plugs the gap between interest rates

BY WILLIAM CHISLETT IN MEXICO CITY

FOR THE past two months Mexican banks have been operating under a new and more flexible system of peso interest rates...

are becoming less competitive. External factors are the basic reasons behind the Central Bank's decision...

announced every Monday and remain in effect until the following Friday. The Bankers Association inserts an advertisement...

There seems little doubt that in certain areas of lending, American banks have now been placed in a position of competitive disadvantage...

Some bankers hope that American corporate borrowers with extensive overseas operations may turn to the U.S. banks for foreign currency borrowing alternatives...

What also worries the U.S. banking community, however, is that the measures will prove to have a qualitative impact on such lending.

The further rise in U.S. interest rates introduced by the Fed and a continuing high level of loan demand...

Mr. Paul Volcker, the Fed chairman, has laid down, for the first time, that agencies and branches of foreign banks in the U.S. are subject to reserve requirements...

In New York itself, the commercial paper market could well be stimulated as a bigger source of non-bank funding, free of reserve requirements.

Some immediate expressions of concern that the new measures may jeopardise the ability of U.S. banks in the Eurocurrency markets to assist in the role of recycling surplus oil funds...

Uniroyal has shed more than 20 business units since 1974, representing about \$850m in sales. The company has vigorously denied any intention of selling the U.S. tyre operations.

The process has declined considerably over the past two years as the Government, bolstered by the country's immense oil reserves, has restored confidence by implementing an austerity programme...

A switch from a decades-long policy of fixed interest rates for peso deposits to a more flexible system is being tried by Mexico to reduce the flow into dollars.

to stem the amount of dollars in the domestic banking system. Mexico has complete freedom of exchange transactions.

Winn-Dixie moves ahead

EARNINGS FOR the first quarter of this year are 2.5 per cent up at \$20.2m at Winn-Dixie Stores, the U.S. operator of nearly 1,200 food markets...

Dollar Eurobond prices fall

BY FRANCIS GHILES

STRAIGHT DOLLAR bond prices were marked down sharply yesterday in the wake of the measures announced in Washington over the weekend...

reaching 14 1/2 per cent and six-month rates 14 1/4 per cent yesterday, the yield gap is still too great to tempt investors back into the market.

Municipal Financial Authority of British Columbia while Citicorp had announced a three-year issue for Development Finance Corporation of New Zealand.

Quebec sees win at year-end over Asbestos

By Robert Gibbins in Montreal

M. JACQUES PARIZEAU, the Quebec Finance Minister, claims that the Provincial Government will be in control of Asbestos Corporation by the year-end...

Steady growth at Dow Jones

BY OUR FINANCIAL STAFF

DOW JONES, publisher of the Wall Street Journal, as well as of Barron's and a chain of 19 local newspapers, announced increases of around one fifth in both sales and net earnings...

lapse increases of 10.3 per cent at the Wall Street Journal and 17.4 per cent at Barron's.

group now shows net earnings 18 per cent higher at \$37.5m, with share earnings at \$2.42 a share against \$2.05. Sales at \$318.2m are 22 per cent up.

FT INTERNATIONAL BOND SERVICE

The list shows the 200 latest international bond issues for which an adequate secondary market exists. For further details of these or other bonds see the complete list of Eurobond prices published on the second Monday of each month.

Table with columns for U.S. DOLLAR, OTHER STRAIGHTS, CONVERTIBLE BONDS, and YEN STRAIGHTS. Includes bond names, amounts, and yields.



PETROLES DEL PERU

U.S.\$388,600,000 MEDIUM TERM CREDIT FACILITY

THE REPUBLIC OF PERU

- CHASE MERCHANT BANKING GROUP, AMERICAN EXPRESS BANK INTERNATIONAL GROUP, BANCO DO BRASIL S.A., THE BANK OF TOKYO, LTD., CITICORP INTERNATIONAL GROUP, EURO-LATINAMERICAN BANK LIMITED, MORGAN GUARANTY TRUST COMPANY OF NEW YORK

- BANCO DE LA NACION, BANCO DE LA NACION ARGENTINA, BANCO DI ROMA, THE BANK OF NOVA SCOTIA GROUP, CHEMICAL BANK INTERNATIONAL GROUP, CREDIT LYONNAIS, LIBRA BANK LIMITED, MANUFACTURERS HANOVER LIMITED, NATIONAL WESTMINSTER BANK LIMITED

- BANCO DE LA PROVINCIA DE BUENOS AIRES, BAYERISCHES VEREINSBANK, CROCKER NATIONAL BANK, SECURITY PACIFIC BANK

- BANCO EXTERIOR DE ESPAÑA, BANQUE SUDAMERIENS, CREDIT SUISSE, DEUTSCH-SUDAMERIKANISCHE BANK AG., UNITED CALIFORNIA BANK

- AMERICAN EXPRESS INTERNATIONAL BANKING CORPORATION, ASSOCIATED JAPANESE BANK, BANCO DE BOGOTA S.A., PANAMA, BANCO DE ITALIA Y FIO DELLA PLATA, BANCO DE LA NACION ARGENTINA, BANCO DE LA PROVINCIA DE BUENOS AIRES, LOS ANGELES AGENCY, BANCO DI PONCE, BANCO DI ROMA, NEW YORK BRANCH, BANCO DO BRASIL S.A., GRAND CAYMAN BRANCH, BANCO EXTERIOR DE ESPAÑA, BANCO SUDAMERIS INTERNACIONAL S.A., BANK FÜR GEMEINWIRTSCHAFT AG., NEW YORK CAYMAN ISLAND BRANCHES, THE BANK OF NOVA SCOTIA INTERNATIONAL LIMITED, THE BANK OF TOKYO, LTD., BANQUE BRUXELLES LAMBERT S.A., BANQUE VERNIER ET COMMERCIALE DE PARIS, BANQUE HYPOTHECAIRE-LIND WECHSEL-BANK, AKTIENGESELLSCHAFT, DRYDEN BANKING GROUP, BAYERISCHES VEREINSBANK INTERNATIONAL, THE CHASE MANHATTAN BANK, N.A.

- CHEMICAL BANK, CITIBANK, N.A., CREDIT LYONNAIS, CREDIT SUISSE, CROCKER NATIONAL BANK, DEUTSCH-SUDAMERIKANISCHE BANK AG., PANAMA BRANCH, EURO-LATINAMERICAN BANK LIMITED, EUROPEAN AMERICAN BANKING CORPORATION, FIRST BANK MINNEAPOLIS, FIRST NATIONAL STATE BANK OF NEW JERSEY, INTERNATIONAL COMMERCIAL BANK LIMITED, INTERNATIONAL MEXICAN BANK LIMITED, INTERNATIONAL WESTMINSTER BANK LIMITED, LIBRA BANK LIMITED, MANUFACTURERS HANOVER TRUST COMPANY, MORGAN GUARANTY TRUST COMPANY OF NEW YORK, NATIONAL BANK OF NORTH AMERICA, THE PHILADELPHIA NATIONAL BANK, REPUBLIC NATIONAL BANK OF NEW YORK, ROYAL BANKING CORPORATION LIMITED, THE SANWA BANK, LIMITED, SECURITY PACIFIC BANK, UNITED CALIFORNIA BANK, NASSAU, BAHAMAS

AGENT THE CHASE MANHATTAN BANK, N.A.

THE PHILIPPINE INVESTMENT COMPANY S.A.

Net Asset Value as of July 31, 1979 U.S.\$12.35 Listed Luxembourg Stock Exchange

THE PHILIPPINE INVESTMENT COMPANY S.A.

Net Asset Value as of August 31, 1979 U.S.\$13.05 Listed Luxembourg Stock Exchange

BRAZILIAN INVESTMENTS S.A.

Net Asset Value as of 28th September, 1979 Per Depository Share: U.S.\$100.46 Per Depository Share (Second Series) U.S.\$74.25 Listed The London Stock Exchange

مركز التمويل

Companies and Markets INTL. COMPANIES and FINANCE

Compagnie Bancaire well ahead in first six months

BY DAVID WHITE IN PARIS

COMPAGNIE BANCAIRE, the French specialist credit institution, has announced consolidated net profit of FF 176m (\$42.9m) for the first half of the year, well ahead of the rate needed to surpass the 1978 annual profit level of FF 206m.

had reached FF 3.8bn. A similar profit trend was registered at its four main affiliate groups.

Union Francaise des Banques, a short- and medium-term lender to small industry, showed first half net profit of FF 75m against FF 116m in the 1978 full year.

Roussel buys 80% shareholding in SAMP

By Our Paris Staff

ROUSSEL-UCFAR, the French pharmaceutical concern, has expanded its range of activity by taking over one of the country's leading makers of sunglasses.

The company has taken an 80 per cent stake in Societe d'Application des Matieres Plastiques (SAMP), better known by its brand name Solar.

The company, based at Annecy, was previously family-owned. Terms of the deal were not published.

Roussel-UCFAR said that the acquisition fitted in with its policy of diversification and of expanding activity outside the strictly medical and veterinary fields—namely in perfumes and cosmetics.

Dutch building group cautious

BY CHARLES BATCHELOR IN AMSTERDAM

BALLAST-NEDAM, the Dutch construction group, has forecast a sharp rise in turnover in the current year, but was cautious in predicting profit levels.

In 1978 profits were 37 per cent higher than the previous year, and in April Ballast-Nedam said that it expected a further rise in profit this year.

The company's order book is worth Fl 3.3bn, compared with Fl 4.8bn at this time last year.

Earlier this year, Ballast arranged medium-term loans worth a total of Fl 50m to strengthen its capital position.

largely to the completion of part of a Fl 4.7bn housing project in Saudi Arabia, the largest ever won by a Dutch concern.

THE SHARE investment fund, Rolinco, which is part of the Dutch Robeco group, plans to declare a 5 per cent scrip issue for 1978/79, writes Charles Batchelor from Amsterdam.

The issue will be made from the share premium reserve and will be tax-free in the Netherlands and a number of other countries, Rolinco said.

Net profit for the financial year ended on August 31 rose by 2.5 per cent to Fl 81.5m (\$42m). After falling by 8 per cent in the first half of the year, the value per share rose by 12 per cent during the second half.

ACF said that the results for the first six months were adversely affected by unfavourable developments on the quinine market. The results of other divisions were also unsatisfactory.

THE DUTCH pharmaceutical concern ACF Holdings turned in sharply lower profits for the first half of the current financial year, writes our financial staff.

ACF forecast that second half profits would be about equal to the performance of the first half.

Koc seeks oil venture partner

BY METIN MUNIR IN ANKARA

THE KOC group of Istanbul, Turkey's biggest private industry conglomerate, is looking for a suitable American partner which would provide technology and capital for joint oil exploration in Turkey.

The group has applied for oil exploration permits in an area roughly the size of Switzerland in 12 different spots in south-eastern Turkey, adjoining Iraq, where the country's main oil fields are.

Koc is planning to form a new company capitalised at TL 500m (\$10m) in partnership with Is Bankasi, the country's second biggest bank, the company said.

Mr. Bulent Ecevit's Government has authorised Koc, to proceed with the venture.

Mr. Rahmi Koc, the group's president, said that "a lot of parts remain to be put together and at this time you can advise us that we are seriously considering to enter the oil business."

He has nonetheless retained an American lawyer to advise in his negotiations with the American oil companies. His proposal would be that the costs be shared, the Turks meeting local expenses, and the Americans bringing in the necessary foreign financing.

The biggest stumbling block appears to be the question of who gets the oil once it is found and extracted. The Government wants to take all at the well head and pay Koc and its partners prices offered by OPEC members. There is some

doubt as to whether any American company would accept this, preferring payment in kind.

Koc, one of the most solid companies in Turkey, had turned over last year of about \$1,360m. It has wide interests in manufacturing and marketing, producing cars, lorries, buses, electrical household goods, radio and TV sets and liquid petroleum gas.

Mr. Koc's plans materialise, Koc will be the first of Turkey's private industrial giants to go into oil exploration.

Landis and Gyr forecasts improvement

BY JOHN WICKS IN ZURICH

GROUP PROFITS at Landis and Gyr, the Swiss-based electrical engineering concern, are expected to have improved by some 15 per cent in the year to September 30 compared with the SwFr 48m (\$30.4m) achieved in 1977-78.

In a letter to shareholders the parent company said that group sales and orders had increased by several per cent in the year to more than SwFr 1bn. In the previous year, sales were SwFr 886m and orders totalled SwFr 980m.

The company said that while the value of production had risen only slightly to

SwFr 1,03bn, the group benefited from a "gratifying" growth in demand, continued rationalisation of operations and the modest inflation rates in Switzerland and West Germany.

Exchange rate developments were less unfavourable than expected. By comparison, the previous year saw a 9 per cent rise in local currency sales translated to a 4.8 per cent decline in terms of Swiss francs.

The directors are cautiously optimistic about the current year, and say that sales are benefiting from both public and private energy saving programmes brought on by the in-

crease in the price of oil. However, the company is also experiencing higher labour and material costs, and points to a new instability in exchange rates.

Overall a satisfactory result is expected, although the out-turn will probably be less favourable than in the past financial year.

For the year just ended, the board warns shareholders against "unrealistic expectations" on dividends, and says that the payout and the issue of new shares at par will remain within the bounds of its long-term financing policy.

Eurocan to reorganise

By Lance Keyworth in Helsinki

EUROCAN Pulp and Paper Company, the Finnish venture in Kitimat, British Columbia, is to take a Canadian partner in a reorganisation of ownership.

Eurocan is jointly owned by Kymi Kymmene and the state-owned Enso-Gutzeit Oy. Kymi is to sell its 50 per cent share to Enso which, in turn, is offering a 40 per cent shareholding to West Fraser Timber Company, leaving Enso with a 60 per cent controlling interest.

The reorganisation is planned to take effect in November. It will add some of West Fraser's sawmills to the Eurocan sawmill, kraft pulp, paper and board complex. Kymi is moving out of the Canadian project in order to concentrate its resources on its wholly-owned subsidiary Leaf River Forest Products in the U.S.

Eurocan has overcome the teething problems from which it suffered after its establishment 10 years ago. The company reported net sales of Fmk 319m (\$85.5m) in 1978, a 40 per cent increase on 1977.

The Mitsui Trust and Banking Co., Limited. Negotiable Floating Rate U.S. Dollar Certificates of Deposit. Maturity date 6th October 1980. Agent Bank: The Chase Manhattan Bank, N.A., London.

TRENWICK LTD. (Bermuda). TRENWICK REINSURANCE COMPANY LTD. TRENWICK INCORPORATED. 50,000 COMMON SHARES. 45,000 5 PERCENT CLASS B CONVERTIBLE PREFERENCE SHARES.

BRAZIL The outlook for the 1980's. RIO DE JANEIRO-OCTOBER 17, 18 & 19 1979. H.E. Professor Antonio Delfim Netto, Minister of Planning, Brazil, will give the keynote address at this international conference to be arranged by the Financial Times with Varig Brazilian Airlines and Jornal do Brasil.

Domestic bond from NMB

NEDEERLANDSCHE Middenstandsbank plans to borrow between Fl 150m and Fl 200m (\$103m) on the Amsterdam capital market. The bond issue will have a maturity of 10 years and carry a coupon of 9 per cent. It was priced at 99.5 yesterday.

Germany to test market

BY OUR FINANCIAL STAFF

A NEW BOND issue by the West German government is due to be unveiled this morning following a meeting of the Federal Loan Consortium.

The new issue, the ninth by the government this year, is the first major offering of debt to

test the German capital market since August, when DM1.5bn (\$308m) in 10-year government bonds met with a very limited response from investors.

Ahead of the offering, bond markets in Frankfurt were quiet yesterday.

SUDAN DEBT

Major loan sought from Western banks

BY JAMES BUXTON

SUDAN HAS ASKED western banks for a big refinancing loan on concessionary terms to pay off its overdue commercial foreign debt. The amount involved is understood to be in the region of \$1.2bn.

A group of western banks to which Sudan is in debt are currently digesting the Sudanese proposals, which were made at a meeting in London at the end of last month. They plan to hold two meetings this month to formulate their response.

Sudan is expecting to meet the Club of Paris, a consortium of western export credit agencies, next month to discuss the rescheduling of its direct obligations to the different national agencies. In the meantime, it wants to commercial banks to analyse how much of Sudan's foreign debt has been taken over by the

agencies under guarantee arrangements.

Sudan's overdue commercial foreign debt consists of overdrafts on bills of exchange, supplier credits and short and medium term loans to the Sudanese public and private sectors.

Sudan wants the refinancing loan to take into account its debt-servicing schedule, including both principal and interest, for the period up to June 30, 1982, when a three-year agreement with the International Monetary Fund for an economic reform programme ends.

Sudan has decided to make a formal approach to its creditors as part of a concerted effort to repair the damage caused to the economy by several years of over-rapid expansion. In addition to the refinancing loan it wants to receive an inflow of new money to help finance development and imports while

the reform programme continues.

A key part of the programme was the implementation last month of a two-tier exchange rate system, which is designed to channel the remittances of Sudanese working abroad into the domestic banking system to finance imports. The banks are now allowed to authorise more foreign transfers without reference to the central bank, and Sudanese are permitted to open foreign currency bank accounts in Sudan with funds obtained anywhere.

Mr. Badr el-Din Suleiman, the Finance Minister who introduced the new measures, said in London yesterday that the new system was working well, that remittances had started to flow in and that foreign currency bank accounts had been set up almost as soon as the regulations came into force. A cushion of foreign exchange

from outside sources had helped the new system to get under way, he said. Imports were now being financed out of remittances, he said.

The aim of the new system is to give our creditors the confidence that we will be able to honour any rescheduling," he said.

Sudan hopes to be earning considerably more foreign exchange from agricultural exports over the next few years as new development projects come into operation. But in view of the time it will take for the reform programme to achieve results, Sudan has asked for the refinancing of its debts to be on concessionary terms.

Neither the Sudan Government nor western bankers want to see the declaration of a formal default on Sudan's debt. But bankers say that any refinancing arrangements will have to have a firm "commercial basis."

BRAZIL-THE OUTLOOK FOR THE 1980's. To: The Financial Times Limited, Conference Organisation, Bracken House, 10 Cannon Street, London, EC4P 4BY. Tel: 01-236 4382. Telex: 27847 FTCONF G. A FINANCIAL TIMES CONFERENCE

Bank of Tokyo in talks on ties with Mitsubishi Trust

BY RICHARD C. HANSON IN TOKYO

TWO OF Japan's largest commercial banks are discussing a business tie-up which opens the prospect of a major change in the organisation of the Japanese banking community. The Bank of Tokyo, the country's only foreign exchange specialist, and the leading international banker, is talking with Mitsubishi Trust and Banking Corporation about the transfer to Mitsubishi of two outlying branches. Mitsubishi, which is the largest of Japan's trust banks, would acquire BOT's

Nagasaki, Kyushu and Shimizu, central Japan, branches, complete with assets, employees and related facilities and business. Details of such a move have not been completed. A target date of March 1, has tentatively been set, however, according to Japanese Press reports. For the Bank of Tokyo, such a transfer would improve the efficiency of domestic operations. At the end of the last accounting period, BOT had 35 domestic branches compared

with 41 branches abroad and a network of other international ventures. Mitsubishi Trust has been moving aggressively into international lending in recent years, but has only two branches overseas. The two banks have enjoyed close relations for many years. The significance of a deepening of that relationship is in part that it would involve the first tie-up between one of the major City banks and a trust bank. The Bank of Tokyo has found itself challenged by the other large City banks which are also expanding overseas networks rapidly. Meanwhile, the trust banks have found it necessary to expand from their traditional role as sources of long-term investment capital for private enterprise, demand for which has become sluggish over the past decade. Presumably, Mitsubishi Trust would benefit from BOT's long experience internationally.

National bond yield up

TOKYO — The Japanese Finance Ministry has issued Y335.9bn of three-year National bonds through public auction. The 7 per cent bonds were priced at an average of Y99.01, to yield 7.390 per cent, with the lowest accepted price Y98.75, yielding 7.497 per cent. The Ministry floated Y166.2bn of three-year seven per cent bonds in August at an average price of Y98.27, and yield of 7.297 per cent. The ministry said that 42 Japanese banks and securities firms bid for a total of Y465.3bn.

against the Ministry's offer of Y300bn. It accepted bids for only Y235.9bn because other offers were too low. Local securities sources pointed out that the average yield of 7.390 per cent for the newly-issued three-year bonds exceeded the yield at issue of 7.3 per cent for five-year bank debentures. This, it is felt, may disrupt the present long-term interest rate structure in Japan, which has hitherto been maintained under rigid control and guidance. Reuter

ISRAELI RESULTS Solel-Boneh ahead

BY L. DANIEL IN TEL AVIV

SOLEL-BONEH, Israel's largest construction company, owned by the Federation of Labour, raised its net profits by 55 per cent to I\$470.2m (\$16.1m) in the first half of 1979, from the level for same period last year. A pre-tax profit of I\$606m was made on turnover of I\$3.9bn (\$133m).

CLAL, Israel's largest investment company, has reported an increase of 280 per cent in net profits after tax to I\$389m (\$13.4m) in the year to June 30. Over 50 per cent of overall profits came from industrial activities. Group income rose by 75 per cent during the year and exports of the various concerns in the Clal group rose sharply to I\$665m from I\$268m. This represented a gain of 80 per cent in real terms, the company points out.

CLAL's total assets at June 30 1979, stood at I\$1.1bn. The balance sheet covers the activities of some 130 companies. There are three main divisions, the shares of which are registered on the Tel Aviv stock exchange — Clal Industries, Azorim (Construction) and Clal Trade. Clal has already announced an interim cash dividend of 6 per cent with a 20 per cent bonus share distribution to be approved by the next general meeting. In calendar 1978, Clal paid two cash dividends of 6 per cent each and 40 per cent of bonus shares.

approved by the next general meeting. In calendar 1978, Clal paid two cash dividends of 6 per cent each and 40 per cent of bonus shares.

KOOR — The industrial holding company of the Israel Labour Federation, which comprises over 100 factories—reports that its net profit in the first-half of 1979 increased by 50 per cent as compared with the same period last year, to I\$318m (\$11m).

Pre-tax profit, however, dropped to 5 per cent of turnover, from 6.5 per cent because of the rise in financing costs which absorbed a sum equivalent to over 15 per cent of turnover, against 14 per cent a year earlier.

POLGAT — Israel's largest textile combine, enterprises of which range from a woollens plant through knitting mills to factories making men's suits—reports that its net profit grew from I\$30m in the first half of 1978 to I\$77m (\$2.7m) in the first six months this year. The nominal increase of 156 per cent represented a gain, adjusted for inflation, of about 100 per cent. The company expects the favourable trend to continue in the second half.

Grace Brothers bids for control of J. B. Young

GRACE BROTHERS Holdings, the Australian department store group, is bidding for control of its fellow retailer, J. B. Young Holdings, reports Reuter from Sydney. The bid values Young at about A\$35m (U.S.\$39m). Grace already has about 20 per cent of Young's issued capital of 16.31m ordinary shares. The offer is of one Grace share plus A\$2.60 for every Young's share, or cash of A\$4.40 for two Young's shares. Grace Brothers stock was trading here ahead of the announcement at A\$1.98 and that of J. B. Young at A\$1.57. Grace Brothers has also offered 50 cents for each of Young's 573,000 preference shares.

The J. B. Young stores, located throughout New South Wales and Victoria country towns, Grace said, would provide access to a wider market. It added that it did not foresee any difficulty in maintaining the annual dividend rate of 11 cents now being paid by both companies.

Our financial staff adds: Grace last month announced a rise in earnings of almost 11 per cent to A\$13.8m (U.S. \$15.6m) in the year to July 28, on a sales gain of 8.4 per cent to A\$450m (U.S.\$50.8m). The dividend was increased from 10 cents to 11 cents.

Early hopes of buoyancy in the current six months, however, were said by the company to have been "seriously affected" by the Government's mini-Budget in May.

SINGAPORE NEWS

Chia shares for Malayan Credit

BY GEORGIE LEE IN SINGAPORE

MALAYAN CREDIT, the property company, has agreed to acquire 5.93m shares in one of its major shareholders, Jack Chia-MPH (JC-MPH) for some S\$9.2m (U.S.\$4.3m). The shares will give Malayan Credit a 15.2 per cent stake in the issued capital of the JC-MPH group, which at the moment owns 19.7 per cent of Malayan Credit's issued capital. The offer of the shares was made by Jack Chia International

of Hong Kong (4m shares), Apollo Finance and Investment of Hong Kong (1.43m) and Singapore Japan Merchant Bank (500,000) at an average price of around S\$1.55 per share. Apollo Finance and Investment is a subsidiary of Jack Chia International of Hong Kong. Acquisition of the shares from Jack Chia International and Apollo is subject to the approval of Malayan Credit shareholders, as well as to a waiver being granted by the Securities Industry Council from the requirement of making a general offer to the remaining stockholders of JC-MPH should Malayan Credit acquire more shares to bring its stake in JC-MPH to 20 per cent. Share-

holders are to be asked to authorise the purchase of a further 1.87m shares in JC-MPH to bring its stake to 7.8m shares or 20 per cent of JC-MPH capital. Malayan Credit said that the purchase would be financed by proceeds from its recent sale of Malayan Credit House and bank loans. Malayan Credit House was sold to United Overseas Land for \$13m.

For the year to March, JC-MPH reported a net attributable profit of S\$5.23m. Malayan Credit said that had it owned 20 per cent of JC-MPH, the net profit attributable to it would have been S\$1.05m before financial expenses.

Profits boost for brewery group

MALAYAN BREWERIES, the largest brewery group in Singapore and Malaysia, has reported a 10 per cent improvement in group post tax profit to S\$20.1m (U.S.\$9.4m) for the year to June. Turnover rose by 8.6 per cent to S\$320.1m (U.S.\$150m) while the tax charge went up by 11.7 per cent to S\$14.1m. The group has declared a second interim gross dividend of 20 per cent on both its ordinary and management shares. No final dividend will be paid.

SASOL ISSUE

Looking abroad

THE SOUTH AFRICAN Reserve Bank has used the current R35m (\$42m) public issue to break new ground, on lines recommended by the De Kock Commission in January, aimed at enhancing the country's attractions to foreign investors. For the first time, foreign investors are being allowed to make use of the financial rand (South Africa's investment currency which is currently quoted at one financial rand equal to U.S. 87 cents compared with the commercial rate of R1 to \$1.20) to apply for the new Sasol shares. This move might have run into problems if foreigners had been obliged to create sufficient financial rand to cover their applications, especially as the R35m public issue is widely expected to be at least 10 times oversubscribed. That would have had the effect of artificially boosting the financial rand rate ahead of allocation, to be followed by an artificial depression as unsuccessful applicants liquidated their financial rand holdings. To overcome this, the Reserve Bank is allowing local commercial banks to extend overdraft facilities to foreigners with the provision that refund cheques to unsuccessful applicants be applied to repaying the overdrafts within 14 days of share allocations being made. Also successful foreign applicants have 30 days from the time allocations are known to create sufficient financial rand to pay for their allocations. Non-residents with blocked rand accounts, which normally cannot be used for investment other than in prescribed securities, may also use blocked rand to apply for Sasol shares. This again sets a precedent, insofar as it allows non-residents to make more active use of previously restricted blocked rand balances.

CORRECTION—NOTICE OF REDEMPTION
PRIVREDNA BANKA SARAJEVO 9 1/2% DUE 1982
CORRECTIONS
(1) Please read after 2136—2160 and not 2100
(2) Please read after 3975—3979 number misprinted
(3) Please read after 3937—3938 and not 3838
(4) Please disregard 4986 after 4984 as appeared twice

GENOSSENSCHAFTLICHE ZENTRALBANK AKTIENGESELLSCHAFT
Vienna
U.S. \$40,000,000 Floating Rate Notes Due 1983
For the six months
9th October, 1979 to 9th April, 1980
the Notes will carry an interest rate of 1 3/4 per cent. per annum.
Listed on the Luxembourg Stock Exchange.
By: Morgan Guaranty Trust Company of New York, London Agent Bank

This announcement appears as a matter of record only.

PRINOS OIL FIELD and SOUTH KAVALA GAS FIELD

Greece

US \$245,000,000

Project Financing on behalf of

Denison Mines Limited Fluor Corporation
Wintershall Aktiengesellschaft White Shield Greece Oil Corporation
(a subsidiary of Basic Resources Corporation)

Lead-managed by
CANADIAN IMPERIAL BANK OF COMMERCE
in association with
National Investment Bank for Industrial Development S.A.
Athens, Greece

Managed by
Citicorp International Group Westfalenbank Aktiengesellschaft
Banque Nationale de Paris Swiss Bank Corporation

Co-managed by
International Energy Bank Limited The Royal Bank of Canada Texas Commerce Bank

Funds Provided by

Canadian Imperial Bank of Commerce	Citibank N.A.	Westfalenbank Aktiengesellschaft
Swiss Bank Corporation (International) Ltd.	Banque Nationale de Paris	Manufacturers Hanover Bank (Guernsey) Limited
Bank of Montreal	Banque de la Société Financière Européenne	International Energy Bank Limited
The Royal Bank of Canada	National Investment Bank for Industrial Development S.A.	BT Asia Limited
Continental Illinois National Bank and Trust Company of Chicago	Credit Commercial de France	Texas Commerce Bank N.A.

Agent Bank
CANADIAN IMPERIAL BANK OF COMMERCE

SAVE YOUR TIME. SHARE OUR EXPERIENCE
profinor sa

Department of Financial Operations	Service Department	HEDGE INVESTMENT TRUST S.A. Geneva
• Forfeiting	• Administration	• Portfolio Management
• Factoring	• Accounting	• Portfolio Analysis and Investment Guidance
• Treasury	• Secretarial	• General Hedge Investment Corp.
• Loans and Financing	• Establishing New Companies	• Cayman Island
• Securities and Commodities Trading	• Financial and Legal Counselling	
• Transfers and International Payments		

OUR EFFICIENT STRUCTURE WILL MEET YOUR NEEDS. ASK FOR A FREE BROCHURE.

profinor sa P.O. Box 659 - 1211 GENEVA
Tel 28 465 - Phone 022/31 89 82

CURRENCIES, MONEY and GOLD

Dollar firm

Initial reaction to last week's U.S. anti-inflation package pushed the dollar firmer against most currencies...

While there was no perceptible intervention by major central banks, the dollar was pushed even firmer during the latter part of the day...

THE DOLLAR SPOT AND FORWARD

Table with columns: Oct. 8, Day's spread, Close, One month, Three months, p.a. for various currencies like UK, Ireland, Canada, etc.

THE POUND SPOT AND FORWARD

Table with columns: Oct. 8, Day's spread, Close, One month, Three months, p.a. for various currencies like U.S., Canada, etc.

CURRENCY RATES

Table with columns: Oct. 8, Bank Special, Currency, Rate, Bank of Morgan, etc.

OTHER MARKETS

Table with columns: Oct. 8, £, \$, Note Rates for various countries like Argentina, Australia, etc.

WORLD VALUE OF THE POUND

The table below gives the latest available rates of exchange for the pound against various currencies on October 8, 1979...

Large table with columns: PLACE AND LOCAL UNIT, VALUE OF £ STERLING, PLACE AND LOCAL UNIT, VALUE OF £ STERLING for various countries like Afghanistan, Albania, etc.

EMS EUROPEAN CURRENCY UNIT RATES

Table with columns: Country, Currency, % change, Divergence for EMS countries like Belgium, Denmark, etc.

EXCHANGE CROSS RATES

Table with columns: Oct. 8, Pound Sterling, U.S. Dollar, Deutschmark, etc.

EURO-CURRENCY INTEREST RATES

Table with columns: Oct. 8, Sterling, U.S. Dollar, Canadian Dollar, etc.

INTERNATIONAL MONEY MARKET

European short-term interest rates were generally firm yesterday following the latest measures by the U.S. Federal Reserve...

INTERNATIONAL MONEY MARKET

European rates firm

European short-term interest rates were generally firm yesterday following the latest measures by the U.S. Federal Reserve...

GOLD

Weaker tendency

Gold fell \$13 an ounce in the bullion market yesterday as the dollar rose...

UK MONEY MARKET

Small help

Bank of England minimum lending rate 14 per cent (since June 12 1979)...

UK MONEY MARKET

Small help

Bank of England minimum lending rate 14 per cent (since June 12 1979)...

MONEY RATES

Table with columns: NEW YORK, GERMANY, FRANCE, JAPAN, Discount Rate, etc.

LONDON MONEY RATES

Table with columns: Oct. 8, 1979, Sterling Certificate of Deposit, etc.

*That part of the French community in Africa formerly French West Africa or French Equatorial Africa...

POSTIPANKKI announces with pleasure that it has opened a REPRESENTATIVE OFFICE in London at 4-6 Copthall Avenue EC2R 7DA...

WORLD STOCK MARKETS

Companies and Markets

Wall St. trading sharpens after weak start

INVESTMENT DOLLAR PREMIUM... THE MARKET firmed by mid-session in moderate semi-holiday trading after a weak start.

and in British Columbia. Volume leader Dome Petroleum gained 1 1/2 to \$45 1/2...

discount rate rise and concern about a possible rise in the Bank of Japan's discount rate.

Hong Kong The market closed lower with the Hang Seng index down 6.27 points at 676.63...

Switzerland Prices were mixed at the close and profit-taking detracted from the market's otherwise satisfactory performance...

Australia Trading was generally easier, and the All Ordinaries Index lost 2.25 points to 677.17 points.

Indices

NEW YORK - DOW JONES table with columns for Oct 5, 6, 7, 8, 9 and High/Low values.

STANDARD AND POORS table with columns for Oct 5, 6, 7, 8, 9 and High/Low values.

TOBACCO table with columns for Oct 5, 6, 7, 8, 9 and High/Low values.

FRIDAY'S ACTIVE STOCKS table listing various stocks and their price changes.

OSLO table with columns for Oct 8 and Price +/- or Div. Yld.

JOHANNESBURG table with columns for Oct 8 and Price +/- or Div. Yld.

PARIS table with columns for Oct 8 and Price +/- or Div. Yld.

BRUSSELS/LUXEMBOURG table with columns for Oct 8 and Price +/- or Div. Yld.

AMSTERDAM table with columns for Oct 8 and Price +/- or Div. Yld.

VIENNA table with columns for Oct 8 and Price +/- or Div. Yld.

COPENHAGEN table with columns for Oct 8 and Price +/- or Div. Yld.

MILAN table with columns for Oct 8 and Price +/- or Div. Yld.

SWITZERLAND table with columns for Oct 8 and Price +/- or Div. Yld.

SPAIN table with columns for Oct 8 and Price +/- or Div. Yld.

NEW YORK Stock table listing various companies and their prices.

CANADA Stock table listing various companies and their prices.

Brussels Share prices were mostly lower in quiet trading. Cometa and Andre Dumont rose, while Reserve, Sofina and Cockerill...

Frankfurt Share prices closed firmer across the board on active foreign and investment fund.

Milan The stock market closed lower in active trading yesterday and the General Index lost 3.16 per cent.

Amsterdam Share prices closed mainly higher after the rise of the dollar. Royal Dutch gained...

Stockholm AGA AB (Kr. 50) 188 +1.50, Alfa Laval (Kr. 50) 118 +1.50, Atlas Copco (Kr. 25) 7.8 +0.10...

Paris AGF (Fr. 100) 1,250 +24.00, Air Liquide (Fr. 100) 855 +4.00, Alcatel (Fr. 100) 1,200 +10.00...

Brussels AGF (Fr. 100) 1,250 +24.00, Air Liquide (Fr. 100) 855 +4.00, Alcatel (Fr. 100) 1,200 +10.00...

Amsterdam AGF (Fr. 100) 1,250 +24.00, Air Liquide (Fr. 100) 855 +4.00, Alcatel (Fr. 100) 1,200 +10.00...

Vienna AGF (Fr. 100) 1,250 +24.00, Air Liquide (Fr. 100) 855 +4.00, Alcatel (Fr. 100) 1,200 +10.00...

Copenhagen AGF (Fr. 100) 1,250 +24.00, Air Liquide (Fr. 100) 855 +4.00, Alcatel (Fr. 100) 1,200 +10.00...

Milan AGF (Fr. 100) 1,250 +24.00, Air Liquide (Fr. 100) 855 +4.00, Alcatel (Fr. 100) 1,200 +10.00...

Switzerland AGF (Fr. 100) 1,250 +24.00, Air Liquide (Fr. 100) 855 +4.00, Alcatel (Fr. 100) 1,200 +10.00...

Spain AGF (Fr. 100) 1,250 +24.00, Air Liquide (Fr. 100) 855 +4.00, Alcatel (Fr. 100) 1,200 +10.00...

Stockholm AGF (Fr. 100) 1,250 +24.00, Air Liquide (Fr. 100) 855 +4.00, Alcatel (Fr. 100) 1,200 +10.00...

Paris AGF (Fr. 100) 1,250 +24.00, Air Liquide (Fr. 100) 855 +4.00, Alcatel (Fr. 100) 1,200 +10.00...

EUROPEAN OPTIONS EXCHANGE table with columns for Series, Vol., Last, Jan, Last, April, Last, Stock.

BASE LENDING RATES table listing various banks and their rates.

EUROPEAN OPTIONS EXCHANGE table with columns for Series, Vol., Last, Jan, Last, April, Last, Stock.

EUROPEAN OPTIONS EXCHANGE table with columns for Series, Vol., Last, Jan, Last, April, Last, Stock.

Handwritten text at the bottom center of the page.

COMMODITIES AND AGRICULTURE

Companies and Markets

Wool trade expected to stay strong

WELLINGTON — Demand from both traditional and developing wool markets is expected to continue into the second half of the season and the indications are that the strong demand for wool will carry over into 1980, Mr. John Clarke, New Zealand Wool Board chairman said here.

Supply 'squeeze' lifts tin price

BY JOHN EDWARDS, COMMODITIES EDITOR

TIN PRICES rose strongly on the London Metal Exchange yesterday as the shortage of supplies immediately available to the market worsened. Standard grade cash tin gained £180 to £7,530 a tonne, while high-grade cash tin rose by £210 to £7,550.

In lead stocks held in LME warehouses helped push values higher, especially in early trading. Stocks fell by 2,175 to 24,200 tonnes.

Fresh rise in sugar market

By Our Commodities Staff

WORLD SUGAR values surged on the London futures market yesterday afternoon. From Friday's closing at \$14.65 a tonne, the March contract climbed steeply to touch \$150 before easing off to end the day at \$147.40, or \$2.55. The daily prices were fixed \$6 higher at \$151 a tonne.

INTERNATIONAL AGREEMENTS

Rubber pact welcomed

BY WONG SULONG IN KUALA LUMPUR

MALAYSIA HAS warmly welcomed the conclusion of the International Natural Rubber Agreement in Geneva, saying it would have far-reaching economic and social impact on producers and spur output.

On the location of the headquarters for the rubber agreement, he said "virtually all producing countries" had indicated their support for Kuala Lumpur, while "many consuming countries, such as Japan, China, the Soviet Union, and Australia" had also given their endorsement.

Our Commodities Staff writes: There was little reaction on the rubber futures market to the agreement, since it is unlikely to have any effect on prices for some time.

The agreement only comes into "full" force when it can call on money for the buffer stock manager to start operating, when 80 per cent of producers and 80 per cent of consumers have ratified. A period of up to 18 months is allowed for ratification.

UK farmers warned of 'grim future'

BY CHRISTOPHER PARKES

BRITISH FARMERS face a "pretty grim future," Mr. David Lewis, chief agricultural officer of ICI, warned yesterday. They would have to increase production and reduce costs if they are to keep going, he said.

The same problems and must tackle them in the same way. That was to increase output and reduce costs.

Oil shortage threat to Ghana cocoa

By Our Commodities Staff

THE FORTHCOMING 1979/80 cocoa season, starting in Ghana on Friday, could be one of the most difficult in the history of the industry, according to Kwame Agyemang, chief executive of the country's cocoa affairs.

Mansholt changes mind on CAP reform

BY CHRISTOPHER PARKES

DR. SICCO MANSHOLT, father of the Common Agricultural Policy and one-time bane of Europe's peasantry, has changed his mind on the philosophy which underpinned his plans for reform of the EEC's farming industry.

His vision was to have a more humane society. Dr. Mansholt said: "Structural reform should not entail enlargement of units with farmers leaving the land. This would only swell the army of unemployed."

"If three farms of 15 hectares each are upgraded into one farm of 45 hectares, two families are out of work," Dr. Mansholt argued.

Government could either pay them unemployment benefit or direct subsidies to give them an acceptable standard of life. Either way, the cost would be the same.

BRITISH COMMODITY MARKETS

BASE METALS

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit. Includes sub-sections for Wirebars and Amalgamated Metal Trading.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit. Includes sub-sections for Morning and Afternoon prices.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit. Includes sub-sections for Morning and Afternoon prices.

COFFEE

Table with columns for coffee type (Arabica, Robusta), grade, and price per unit. Includes sub-sections for Morning and Afternoon prices.

GRAINS

Table with columns for grain type (Wheat, Barley, Oats), grade, and price per unit. Includes sub-sections for Morning and Afternoon prices.

PRICE CHANGES

Table with columns for commodity type, current price, and change from previous period.

AMERICAN MARKETS

Table with columns for commodity type, current price, and change from previous period.

EUROPEAN MARKETS

Table with columns for commodity type, current price, and change from previous period.

Instant Coffee and other Commodity Prices on the 'electronic newspaper' from Pye.

News as it happens, plus FT Index, foreign exchange prices, travel news, weather forecasts, leisure and much much more. At the touch of a button from a Pye TV set with Teletext.

Commodity Prices. Metal and soft commodities updated twice daily. You can rely on Pye.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

Table with columns for metal type (Copper, Tin, Zinc, Lead, Nickel), grade, and price per unit.

LONDON STOCK EXCHANGE

Gilts fall as hopes of MLR reduction recede further but equities respond to revived institutional demand

Account Dealing Dates
Option
*First Declara- Last Account
Dealings Dates Dealings Day
Sep. 24 Oct. 4 Oct. 5 Oct. 15

Fresh investment funds flowed into leading equities at the start of the new trading Account yesterday and transformed an opening bout of indecision caused by a weekend Press cautious about economic and monetary prospects.

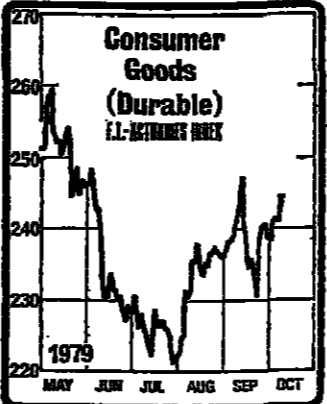
obtain yesterday and selected leaders, including some constituents of the FT 30-share index, made gains extending to 9p in the case of ICI, at 374p. The index recognised this and from being 1.0 easier at 10 am went ahead to close at the day's best with a rise of 6.4 to 486.8 for a gain of 20 points in the last five trading sessions.

balance. Oils were busy again as North Sea enthusiasm revived, but in selected issues the often substantial demand was well met. The strength of the dollar and resulting lower pound took rates for investment currency higher. The upturn was furthered by renewed institutional buying and the premiums closed four points up at the day's highest of 35 1/2 per cent. Yesterday's SE conversion factor was 0.9045 (0.9065).

comment, while A. Henriques spurred 9 to 37p on Friday's bumper first-half profits. Formlister advanced 10 1/2 to 148 1/2 and Walls Fashion put on 4 to 60p, while Lee Cooper again met buying in a restricted market and ended 16 better at 270p. Store leaders traded quietly awaiting statements this week from Debenhams and Marks and Spencer. The former eased 3 to 30p, but the latter firmed slightly to 107p. Combined English Stores, a dull market on Friday following the poor interim profits, found support at the lower end of the day's 49p. In Shoes, Style continued

Speculative counters attracted a fair amount of buyers with William Low advancing 13 to 133p and Hilliards 7 1/2 to 197p. At the request of the company, dealings in Ladbroke were suspended at 196p pending details of the proposed restructuring of the group's casino divisions which were released after the market's official close, trading in the shares is expected to resume at 9.30 am today.

rise again helped those Newspaper issues with North Sea oil interests. Associated jumped 13 to 265p, while International Thomson rose 11 to 414p. Buyers came in for regional issues, East Midland Allied Press rising 4 to 70p and Home Counties adding 3 to 115p. BPC rose 4 1/2 to 44p; the shares have come up from 34p since the disappointing first-half results were announced nearly two weeks ago.



LONDON TRADED OPTIONS table with columns for Option, Ex'rease, Closing offer, Vol., Closing offer, Vol., Equity close, and sub-sections for Nov, Feb, May.

to be bolstered by bid speculation and rose 8 to 253p. Electricals were featured by a late jump of 50 to 173p in Campbell and Isherwood on the announcement of the bid of 175p cash from BTR. Among the leaders, EMI firmed 4 to 94p, while GEC closed a similar amount higher at 382p, after 394p. Bael was supported and rose 7 to 255p. Unitech, 245p, gained 8 pence, while Lawrence Scott responded to Press mention with a rise of 9 to 62p. Buying interest revived in Ward and Goldstone, 6 dearer at 88p. Dreamland gained 5 to 59p.

Engineering leaders made headway, John Brown edging up to close at the day's best with a rise of 3 to 75p, Hawker improving 4 to 190p and Tubes a similar amount to 316p. Selective support was evident elsewhere in the sector with demand in a limited market lifting 3PL Holdings 15 to 212p. Elliott encountered fresh scattered buying and put on 5 more to 320p, while WGI were similarly higher at 106p. Avyshire Metal, 64p, and Starrite, 133p, firmed 2 and 3 respectively following trading statements.

In Foods, Associated Biscuits firmed 3 to 90p with the aid of Press comment ahead of the interim results due today; United Biscuits also added 3, to 88p. Hopes of a coming OPEC price

reflecting heavy gains in U.S. markets late on Friday, South African Gilts gave ground all day on profit-taking in the wake of the falling bullishly \$13 down at \$37.50 following the dollar support package announced over the weekend. Prices generally closed showing marginal losses, with the notable exception of the Gold Field group mines which registered particularly good gains in front of the September quarter results.

FINANCIAL TIMES STOCK INDICES table with columns for Oct 8, Oct 5, Oct 2, Oct 1, Oct 1, Year ago and rows for Government Secs, Fixed Interest, Industrial, Gold Mines, etc.

HIGHS AND LOWS table with columns for High, Low, High, Low, S.E. ACTIVITY and rows for Govt. Secs, Fixed Int., Ind. Ord., Gold Mines, etc.

ACTIVE STOCKS table with columns for Stock, Denomina-tion, Closing price (p), Change, 1979 high, 1979 low and rows for ICI, Oil Exploration, GEC, Shell Transport, etc.

OPTIONS table with columns for DEALING DATES, City, Cons. Gold, RTZ, Johnson Matthey, Louth, Grand Ne, International Thomson, etc.

FT-ACTUARIES SHARE INDICES table with columns for EQUITY GROUPS, Mon., Oct. 8, 1979, Fri. Oct. 5, Thurs. Oct. 4, Wed. Oct. 3, Tues. Oct. 2, Year ago (approx.) and rows for CAPITAL GOODS, Building Materials, etc.

Get the news that affects the market, ahead of the market. Get the electronic newspaper from Pye

Any investor who gets the City and industrial news before the rest of the market, and even before the wire services, is in a unique position to capitalise on it. The electronic newspaper gives you that advantage.



You can rely on Pye

NEW HIGHS AND LOWS FOR 1979

Table listing new highs and lows for 1979 across various sectors like AMERICANS, CANADIANS, BANKS, BEERS, BUILDINGS, CHEMICALS, etc.

RECENT ISSUES

Table listing recent issues in EQUITIES and FIXED INTEREST STOCKS.

RIGHTS' OFFERS

Table listing rights' offers for various companies like Bank Leumi, Benloc, BHP Proprietary, etc.

Renunciation data usually last day for dealing free of stamp duty. Figures based on prospectus estimate. Assumed dividend and yield. Forecast dividend cover based on previous year's earnings. F Dividends and yield based on prospectus or other official estimates for 1979. Q Gross. Figures assumed. Cover allows for conversion of shares not now ranking for dividend or ranking only for restricted dividends. 5 Flares prices public. 6 Pence unless otherwise indicated. 7 Issued by tender. 8 Offered to holders of ordinary shares as rights. 9 Issued by way of capitalisation. 10 Redeemed. 11 Issued in connection with a merger or takeover. 12 Introduction. 13 Issued to former preference holders. 14 Allotment letters (or fully-paid). 15 Provision for partly-paid allotment letters. 16 With warrants. 17 Unlisted security. 18 Issued in units comprising 2 Income shares and 10 Capital shares at 125p per unit.

FT-ACTUARIES SHARE INDICES

These indices are the joint compilation of the Financial Times, the Institute of Actuaries and the Faculty of Actuaries

Table listing EQUITY GROUPS & SUB-SECTIONS with columns for Index No., Day's Change, Est. Earnings Yield, Gross Div. Yield, P/E Ratio, etc.

FIXED INTEREST PRICE INDICES

Table listing fixed interest price indices for British Govt. An. Gross Red. with columns for Index No., Day's change, etc.

1 Redemption yield. Highs and lows record base dates and values and constituent changes are published in Saturday issues. A list of the constituents is available from the Publishers, the Financial Times, Bracken House, Cannon Street, London, EC4A 3DF, price 14p. by post 22p.

AUTHORISED UNIT TRUSTS

Table listing various unit trusts such as Abbey Unit Trst. Mgrs., Friends' Provid. Unit Trst. Mgrs., and others, including their names, addresses, and contact information.

Table listing Mutual Unit Trust Managers (MUTMs) such as 15 Capital Ave., EC2R 7BU, and others, with their respective details.

Table listing various insurance and property funds, including Royal Trust Can. Fd. Mgrs. Ltd., and others.

OFFSHORE & O'SEAS FUNDS

Table listing offshore and overseas funds such as Alexander Fund, Keyser Ullmann Ltd., and others, detailing their investment focus and contact info.

INSURANCE & PROPERTY FUNDS

Table listing insurance and property funds including Albery Life Assurance Co. Ltd., and others, with their names and addresses.

Notes and disclaimers regarding the information provided in the unit trust listings.

Notes and disclaimers regarding the information provided in the offshore and overseas fund listings.

INDUSTRIALS—Continued

Table of industrial stocks including companies like Anglo-Titan, British Petroleum, and various mining and utility firms.

INSURANCE—Continued

Table of insurance companies such as Anglo-Titan, British Petroleum, and various insurance providers.

PROPERTY—Continued

Table of property-related stocks and companies.

INVESTMENT TRUSTS—Cont.

Table of investment trusts and funds.

FINANCE, LAND—Continued

Table of finance and land-related stocks and companies.

NOMURA The Nomura Securities Co., Ltd. with contact information for London and other offices.

MINES—Continued AUSTRALIAN

Table of Australian mining stocks including Anglo-Titan, British Petroleum, and various mining companies.

TINS

Table of tin stocks and companies.

COPPER

Table of copper stocks and companies.

MISCELLANEOUS

Table of miscellaneous stocks and companies.

TEAS India and Bangladesh

Table of tea stocks from India and Bangladesh.

Sri Lanka

Table of Sri Lankan stocks.

Africa

Table of African stocks.

CENTRAL RAND

Table of Central Rand stocks.

EASTERN RAND

Table of Eastern Rand stocks.

FAR WEST RAND

Table of Far West Rand stocks.

O.F.S.

Table of O.F.S. stocks.

FINANCE

Table of finance stocks.

CENTRAL AFRICAN

Table of Central African stocks.

DIAMOND AND PLATINUM

Table of diamond and platinum stocks.

REGIONAL MARKETS

Table of regional market data.

OPTIONS 3-month Call Rates

Table of 3-month call option rates.

NOTES

Notes and disclaimers regarding the data and services provided.

Additional information and contact details for the publisher.

LEISURE

Table of leisure and entertainment stocks.

MOTORS, AIRCRAFT TRADES

Motors and Cycles

Table of motor and cycle stocks.

Commercial Vehicles

Table of commercial vehicle stocks.

Components

Table of component stocks.

Garages and Distributors

Table of garage and distributor stocks.

NEWSPAPERS, PUBLISHERS

Table of newspaper and publisher stocks.

PAPER, PRINTING

ADVERTISING

Table of paper, printing, and advertising stocks.

PROPERTY

Table of property stocks.

SHIPPING

Table of shipping stocks.

SHOES AND LEATHER

Table of shoe and leather stocks.

SOUTH AFRICANS

Table of South African stocks.

TEXTILES

Table of textile stocks.

TOBACCO

Table of tobacco stocks.

TRUSTS, FINANCE, LAND

Investment Trusts

Table of investment trusts.

Finance, Land, etc.

Table of finance, land, and other stocks.

INSURANCE

Table of insurance stocks.

Food industrial valuers

Ohira fails to meet election target

BY CHARLES SMITH IN TOKYO

JAPANESE voters upset all predictions last night by returning Prime Minister Masayoshi Ohira and the ruling Liberal Democratic Party to office with only 258 seats, two more than required to give it a bare majority in the 511-seat lower House of the Diet.

Without the independents the Liberal Democrats would have been a minority in the Lower House, although still much larger than any single opposition party.

The Liberal Democrats' failure to improve on their 1976 performance (when economic conditions in Japan were much worse than now) was attributed last night to complacency on the part of campaign organisers who assumed that victory was certain.

White MPs back Smith's rejection of proposals

BY TONY HAWKINS IN SALISBURY

ALL 34 members of the white Rhodesian Front parliamentary caucus who are in Zimbabwe Rhodesia, yesterday voted unanimously to support Mr. Ian Smith's rejection of Britain's constitutional proposals.

The caucus, comprising 24 members of parliament and 10 senators, implicitly criticised Bishop Muzorewa, the Prime Minister, in its statement, saying that no good purpose was served by taking up hard and fast attitudes at this delicate stage of the negotiations and when the entire package deal is not yet known.

and of the security forces during the transitional period, it is thought. In its statement yesterday, the caucus said it "views it as essential to any settlement that sanctions are lifted, the war ended and recognition granted by the British Government."

North Sea profit just offsets fall in rest of industry

BY DAVID FREUD

A SHARP increase in profits from North Sea oil and gas just offset a 10 per cent decline in the profits of the rest of industry in the first half of the year.

Profits outside the North Sea in the April-June period rose 20 per cent from the low level of the first three months of the year when results are thought to have been affected by the severe winter and industrial disputes.

Official income and expenditure figures yesterday by the Central Statistical Office show that the recovery of profits net of stock appreciation in the first half at 10.2 per cent below the previous six months, seasonally adjusted. Compared with first-half 1978 there was a 1 per cent drop.

The figures show that consumers cut heavily into savings to beat the Budget shopping in the second quarter.

Real disposable incomes continued to rise. People are 15.3 per cent better off than in mid-1977.

The profit figures suggest that the steady improvement in profitability since the low point of 1975 has ended.

The Bank of England said in its latest quarterly bulletin that real rates of return on net trading assets of industrial and commercial companies, excluding North Sea, might fall this year below the 3 per cent of 1975 after recovering to 4 per cent last year.

Gross trading profits from North Sea oil and gas rose 21 per cent between first and second quarters to a record £1.08bn.

In the half year there was a 60.2 per cent rise over the previous six months. These figures are seasonally adjusted and take account of increases

Table with 2 columns: Year, Personal disposable income at 1975 prices, Gross trading profits excluding North Sea oil net of stock appreciation, £m, seasonally adjusted.

Source: Central Statistical Office

in value of stocks due to inflation. The rise was partly due to 11 per cent increase in volume of crude oil sold from the first to the second quarter, and partly to the 33 per cent increase in dollar price of crude from April to June.

The North Sea profitability rise was enough to hold first-half profits of industrial and commercial companies at £3.82bn, only £9m less than in the previous six months.

Excluding the North Sea, trading profits of industrial and commercial companies were £3.83bn in the second quarter, against £3.02bn in the first.

Living standards, measured by real disposable personal incomes, rose 1.6 per cent in the second quarter after a rise of 0.8 per cent in the first. The large second-quarter increase reflects a delayed pay settlement.

Real disposable incomes in the second-quarter were 6.3 per cent higher than a year earlier. About a sixth of the rise was due to cuts in personal taxation. The remainder was because pre-tax incomes rose faster than prices.

Esperanza refuses to aid subsidiary

BY ANDREW FISHER

ESPERANZA, the UK transport and trading group, is standing by its decision not to help a subsidiary successfully sued by a U.S.-controlled oil trading company for \$2.1m for inadequately checking the quality of an oil cargo.

The UK group made this clear yesterday after Lord Denning, Master of the Rolls, lifted a stay of execution of the judgment made in July. It requires the subsidiary, Caleb Brett and Son, to pay the sum to International Petroleum Trading controlled by Hamilton Brothers Oil of Denver, Colorado.

Lord Denning said he saw no reason to continue the stay of execution, because he doubted that Esperanza, a public company, which made a £3.8m pre-tax profit in the year to March 31, would actually refuse to help out its subsidiary. Caleb Brett has appealed against the original judgment.

The question of whether Esperanza has a legal duty or would be commercially wise to assist Caleb Brett has been a key feature of the case. Esperanza says it based its decision on legal advice. Mr. Justice Parker, who gave the original July judgment, accepted the right in law of the holding company to stand aside, although adding: "It may well be that it is an attitude which is unfortunate."

The issue arose from delivery to a Japanese port in early 1976 of a cargo of 30,000-40,000 tonnes of oil in a largely solidified state. IPT had bought the oil from AGIP of Italy and sold it to American Independent Oil Company of New York (Aminoil). It was transported from Sardinia by P and O.

Aminoil sold the oil to Nippon Mining of Japan.

Nippon initially refused to accept any of the oil but later agreed to take some. Aminoil received \$1.08m from International Petroleum Trading in settlement of breach of contract claims, while P and O has been paid \$725,000 for the cost of delays, cleaning and extra bunkers.

It was the Italian subsidiary of Caleb Brett, Petrospector, which actually inspected the cargo, giving rise to International Petroleum's \$2.1m claim.

Commenting on Lord Denning's decision, Lord Kissin, the chairman of Esperanza, said: "According to legal opinion we have received, we cannot, without the directors making themselves personally liable to shareholders, pay this sum unless there are overriding commercial reasons." He added that it was the board's unanimous view that there were no such reasons in this case.

In Esperanza's latest annual report Lord Kissin said: "In view of the provisions already made in our profit and loss accounts, the board does not anticipate that there will be any material change in the group's earnings capacity or financial position should the appeal by these subsidiaries fail."

Lord Denning said yesterday that as a result of this statement, shareholders have been led to believe that Esperanza would support its subsidiary.

Lord Denning said he thought Esperanza could suffer "enormous damage" if it did not support its subsidiaries. Lord Kissin commented yesterday, however, that his statement in the report did not imply that Esperanza was ready to go to the assistance of Caleb Brett. The provisions had been agreed with the auditors, he said.

Joseph will visit China early next year

BY JOHN ELLIOTT, INDUSTRIAL EDITOR

PLANS ARE being drawn up for Sir Keith Joseph, Industry Secretary, to visit China early next year, when he may have talks with Government leaders about potential industrial orders for UK companies.

The visit was suggested by the Society of British Aerospace Companies, which is staging an exhibition of British aviation equipment in Shanghai at the end of March. At the same time British Airways plans to start scheduled flights between London and Peking.

Talks are going on between the British and Chinese Government about the trip. It may be finalised before Chairman

Hua Guofeng visits London at the end of this month as the guest of the British Government.

Britain has not obtained any major industrial orders since Mr. Eric Varley, then Industry Secretary, led a UK team to China at the beginning of this year. The possibility of orders, and the sale of the controversial Harrier jump jets, will be on the agenda while Chairman Hua is in Britain.

Meanwhile, Lord Trenchard, Minister of State for Industry, is to visit Japan at the end of next week to explore the potential for Japanese investment in the UK.

World trade news, Page 6

THE LEX COLUMN

Glaxo's profits catch a cold

When Glaxo produced disappointing figures a year ago, the charitable assumption was that the group's profits had reached a temporary plateau waiting for new products to show through. This year there has been a decisive movement, but in the wrong direction: pre-tax profits are down to £72.3m from £88.4m.

The high sterling rate, which has squeezed export margins badly, is clearly partly to blame. Glaxo sets translation losses on net current assets abroad against trading profits, and its exposure to Japan has been a particular problem given the very weak yen.

But even adding back the £12m that the group says the exchange rate has cost it, there is still a fall in profits, with some underlying deterioration in the second half.

Glaxo does not seem to have reversed the decline in the world market share of its established products and conditions in the international markets for products such as cephalosporins have become increasingly competitive.

In the UK, selling prices of ethicals appear to have been lagging behind costs, and research and development spending is rising. The push into the U.S. market is still at an early stage, and registration of new products there is proving slow and expensive.

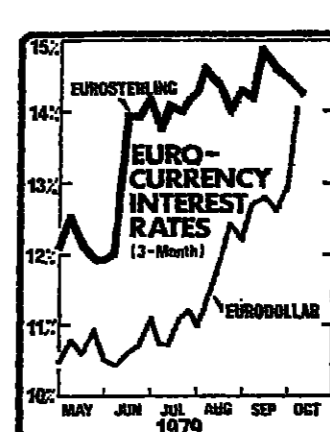
Meanwhile the progress of the new drugs, Zinacef and Trandate, has been no more than steady. Zinacef has done well in Germany, but Heechee, which has been marketed in the U.S. since 1975, is now producing its own rival product. The ulcer drug ranitidine is considered very promising, but its launch is still a couple of years away.

Perhaps because the figures were too poor to send out into the world on their own, Glaxo has raised its dividend significantly—16p net for the year, against 11.4p. But the 5 per cent yield at 470p is not much of a support, while the p/e of 11.4 is still ambitious given the dull immediate outlook.

Ladbroke

Faced with the refusal of a London Licensing Committee to renew three of its casino licences, Ladbroke had four options. It could have done nothing—obviously a risky course pending the outcome of the rehearing. It could have tried to sell all or part of its casino interests, but it would not have got a price that even approached their value in terms of dividend paying power. It could have split off the casino division completely and distributed its shares to Ladbroke shareholders—but that might have brought tax complications

Index rose 6.4 to 486.8



the year than in the second, and nothing it has seen this autumn makes it change its view. The pre-Christmas trade is strangely quiet, and the VAT rise seems to be a serious drag on demand.

It may just be that the heavy spending in June has caused the normal Christmas business to be postponed, and that the tax rebates will soon bring a pick-up in business. Certainly, unless Freemans' worst fears are justified, the group should make £18m this year against £16.7m last time. But next year keener competition in the mail-order business may put pressure on gross margins and, with a p/e of 12.1 fully-taxed and a yield of about 3 per cent at 162p the shares are demandingly rated.

Markets

The financial markets were moving in widely different directions in London as they tried to adjust to the weekend measures in the U.S. without any lead from the New York markets, which were closed for Columbus Day. Sterling weakened sharply against the dollar, as did most major currencies, and gilt-edged lost half a point or more at both the short and long ends.

But domestic sterling money market rates showed little change, though Eurodollar interest rates jumped sharply. Meanwhile, equities brushed aside all the interest rate worries and continued the notably firm trend of the past few days; the FT 30-Share Index has now broken up out of its recent narrow trading range and is at its highest level since June.

For the time being the equity market is affected by a lack of stock—whether from sellers or from new issues—rather than by the fundamentals. At least yesterday's company sector statistics showed the expected recovery in profits between the first and second quarters. But excluding the North Sea sector profits net of stock appreciation have shown no growth on last year; and stock appreciation in the first half jumped to £2.4bn against £1.4bn in the same period of 1978.

The pressures could well intensify in the second half. With sterling turning weaker, yesterday's wholesale price indexes show a further jump in the input index, now showing 17 per cent growth on a year-on-year basis. So both labour and raw material costs are racing ahead of wholesale output prices, up 14 per cent for home sales and no doubt much less for exports.

Freemans

Freemans has pushed pre-tax profits in the six months to July up to £7.2m from £7.2m, and but for the transport strike which it reckons may have cost £0.6m, net margins would have been held. The strike apart, Freemans was expecting a better relative performance in the first half of

Weather

UK TODAY RAIN. Brighter weather later. London, S.E. England, E. Anglia Cloudy. Occasional rain. Max. 19C (66F).

E. and Cent. S. England, E. Midlands, Channel Islands Rain. Bright intervals. Max. 19C (66F).

S.W. England, Wales, Isle of Wight Heavy showers. Sunny intervals. Max. 16C (61F).

N.W. England, Lakes, S.W. Scotland Rain. Bright intervals. Max. 16C (61F).

Aberdeen, N.E. Scotland, Orkney, Shetland Rain. Max. 14C (57F).

Rest of Scotland Rain. Bright intervals. Max. 16C (61F).

N. Ireland Showers. Sunny intervals. Max. 15C (59F).

Outlook: Unsettled.

WORLDWIDE

Table with 3 columns: Location, Y'day mdday, Y'day mdday. Lists weather forecasts for various global locations like Algiers, Amman, Athens, Bahrain, Barcelona, Beirut, Belfast, Belgrade, Berlin, Biarritz, Blackpt, Bingham, Bologna, Bristol, Brussels, B. Aires, Cairo, Cardiff, Casablanca, Cebu, Chicago, Cologne, Copenhagen, Corfu, Dublin, Dusseldorf, Edinburgh, Faro, Florence, Frankfurt, Funchal, Geneva, Gibraltar, Glasgow, Gmsay, Helsinki, Hong Kong, Incheon, Innsbruck, I. N. Man, Jersey, Jo'burg, L. P. Lima, Lisbon, C. Coudy, F. Fair, R. Rain, S. Sunny.

Tories urged to capture centre

BY RICHARD EVANS, LOBBY EDITOR

A CALL for the Conservative Party to capture the centre ground of British politics following the divisions in Labour's ranks was made by Lord Thorneycroft last night on the eve of the Tory conference.

Speaking at a press conference in Blackpool, he said, that last week's Labour conference had been bad news for everyone and had left a very heavy responsibility on the Government to represent "a democratic heart of the country, including the millions of trade unionists who voted for the Conservatives at the last election."

Labour's deliberations had shown the party had no viable economic strategy and the conference had encouraged Marxist elements.

There are signs from the supplementary agenda published last night that there will still be trouble for the platform on Rhodesia, even though Ministers

remain confident that Lord Carrington will get an enthusiastic reception for the work he has done at the Lancaster House talks.

There are five amendments down to the neutrally worded motion on Rhodesia for debate tomorrow afternoon. Three of them, including two from right-wing MPs, seek to exert pressure on the Government to lift sanctions.

An amendment to Thursday's debate on economic policy and taxation calls on the Government "to accord to the ending of inflation priority over all other objectives, including the reduction of taxation."

Lord Thorneycroft confirmed that Ministers would take advantage of the conference to explain more positively the reasons for proposed public expenditure cuts and would challenge Labour leaders to state how they would have financed their spending plans.

Editorial comment Page 18

Continued from Page 1

Ladbroke

director of Ladbroke, will not be on the City and Provincial board.

The casino division is being separated to minimise the risk that applications for the renewal of the Ladbroke casino licences will be refused next month, Mr. Stein said yesterday. The move would reduce or eliminate all possible connection between the casino operation and the parts of the Ladbroke Group which had allegedly breached the Gaming Act in the past.

In July this year, subsidiaries of Ladbroke were refused renewal of three casino licences by South Westminster licensing magistrates on the grounds that they were not "fit and proper persons to be holders of gaming licences." The appeal by way of rehearing at Knightsbridge Crown Court will start on November 5.

At the earlier hearing the

police and Playboy Club of London objected to the renewal of the licences. The police would not say yesterday whether they would withdraw their objections now. But Playboy's European chief, Mr. Victor Lowmace, said his first inclination was to press on with his objections.

The Gaming Board, while not a formal objector last July, also spoke against the renewal of the licences. Ladbroke said yesterday that it expected the restructuring would "meet the requirements of the Gaming Board."

The Gaming Board said it would consider the scheme.

Ladbroke also announced yesterday unadmitted profits of £20.5m for the casino, bingo and lottery divisions and £16.1m for the remainder of the group for the 35 weeks ended September 4. The group made a total profit of £41m in 1978.

Advertisement for CRENDON steel. Text: 'We're always putting steel in its place at CRENDON'. Includes an image of a steel structure and contact information for CRENDON CONCRETE CO. LTD.